Accepted Manuscript

Media Censorship and Stock Price: Evidence from the Foreign Share Discount in China

Rong Ding, Wenxuan Hou, Yue (Lucy) Liu, John Zhang

PII: S1042-4431(17)30268-8
DOI: https://doi.org/10.1016/j.intfin.2018.02.005
Reference: INTFIN 1019

To appear in: *Journal of International Financial Markets, Institutions & Money*

Received Date: 8 June 2017
Accepted Date: 22 February 2018

Please cite this article as: R. Ding, W. Hou, Y. (Lucy) Liu, J. Zhang, Media Censorship and Stock Price: Evidence from the Foreign Share Discount in China, *Journal of International Financial Markets, Institutions & Money* (2018), doi: https://doi.org/10.1016/j.intfin.2018.02.005

Media Censorship and Stock Price: Evidence from Foreign Share Discount in China

Rong Ding,[a] Wenxuan Hou,[b,1] Yue (Lucy) Liu,[b] and John Zhang[c]

[a] *Warwick Business School, University of Warwick, Scarman Road, CV4 7AL, UK*
[b] *University of Edinburgh Business School, University of Edinburgh, 29 Buccleuch Place, Edinburgh, EH8 9JS, UK*
[c] *Durham University Business School, Durham University, Millhill Ln, Durham DH1 3LB, UK*

[1] Corresponding author. Email: wenxuan.hou@ed.ac.uk; Tel: +44 (0) 131 651 5319

Media Censorship and Stock Price: Evidence from the Foreign Share Discount in China

Abstract

This paper studies the price implication of media censorship in the context of the long-standing foreign share discount puzzle in China. We conjecture that the government censors negative news and promotes positive news in Chinese media, leading to the premium on A-shares, which are mainly traded by domestic investors. We find that the ratio of positive to negative news is substantially higher for Chinese newspapers than English newspapers. Such favouritism is found to inflate the price of domestic A-shares and contribute to the discount of foreign B-shares from the same firms. We also provide evidence that B-share investors pay more attention to bad news, while A-share investors pay more attention to good news. Our findings suggest that the news perception distorted by media censorship helps to explain the foreign share discount puzzle and has important implications for international capital flows.

Keywords: China; cross-listed firm; foreign share discount; media censorship; tone of media

JEL Codes: G12; G15; G18

Journal of International Financial Markets, Institutions and Money, 2018 forthcoming

1. Introduction

The media plays a key role in the financial market (Barber and Odean, 2008; Fang and Peress, 2009; Engelberg and Parsons, 2011; Tetlock, 2008, 2014). Media outlets such as newspapers generate and disseminate financial information to a broad audience in a timely manner (Zingales, 2000; Soltes, 2010). The media can also play an active governance role when direct monitoring is ineffective or costly (Dyck and Zingales, 2002). However, the ownership structure and freedom of the media could potentially prevent it from playing effective information dissemination and monitoring roles in the financial market. Using media ownership data of 97 countries, Djankov et al. (2003) find that greater government ownership is associated with lower press freedom, poorer governance and less developed stock markets. Their results are consistent with the public choice theory that incumbent politicians could distort and/or manipulate information to entrench themselves, reduce the dissemination of information and consequently impair markets, if the media is largely government-owned (Sen, 2001; Besley and Burgess, 2002).

Although prior studies suggest that politicians have incentives to censor negative information, and press freedom could influence the development of financial markets (Djankov et al., 2003), how such media censorship affects stock price remains unanswered. More importantly, in the context of cross-border investments, what is the impact of such media censorship on foreign investments in stock markets (e.g. investments in cross-listed firms)? The answers to these pertinent questions have important implications for asset pricing, international capital flows and foreign investments. In this paper, we empirically

examine the effect of media censorship on stock price in the setting of the foreign share discount in China.[1]

China provides a unique opportunity to study this issue for three important reasons. First, the Council on Foreign Relations notes that the Chinese government has long kept tight reins on the media. The France-based watchdog group Reporters Without Borders ranked China 176 out of 180 countries in its 2016 worldwide index of press freedom. China has the highest level of state ownership of newspapers (Djankov et al., 2003; Kim et al., 2014) and the lowest level of press freedom (Kim et al., 2014).[2] Such an extreme media environment enables us to more easily observe the impact of media censorship on stock price. Second, the Chinese government has the incentive and ability to suppress unfavourable news in traditional and internet media. On the one hand, local governments incur a reputation cost when firms in their regions report poor performance, because negative information shows weakness and results in a "loss of face" for local politicians. On the other hand, traditional media channels (i.e. newspapers) are controlled by the government and party organizations through direct ownership, licensing and financial support (see Section 2.1 for a comprehensive discussion). The internet and social media are actively regulated and monitored, and both channels are subject to censorship (Stockmann, 2013).[3] Finally, some Chinese firms have dual classes of

[1] Cumming et al. (2016) test whether the difference in media coverage in the Chinese and English business press for the same firm is associated with the foreign share discount, using a sample of cross-listed firms between 2004 and 2008. They find that the discount is greater for firms with more coverage in the Chinese business press than English business press, and the effect is more salient among firms with lower analyst following and less institutional ownership. Our study is different from Cumming et al. (2016) in two important ways: first, we focus on the disparity of tone of news reported by Chinese and English newspapers (instead of the difference in number of news stories), and how it contributes to the magnitude of foreign share discount; second, we find that the divergence in tone between Chinese and English newspapers plays a more significant role in explaining the foreign share discount for firms with a better information environment (i.e. firms with more analyst following). This implies that news coverage and tone influence stock price, possibly through different channels.

[2] Kim et al. (2014) construct a press freedom proxy based on press freedom indices and some other data items provided by Freedom House and Reports without Borders.

[3] Since 1997, more than sixty internet regulations have been enacted by the Chinese government and implemented by provincial branches of state-owned internet service providers and commercial organizations. At least 18,000 websites are blocked from mainland China, including 12 of the Top 100 Global Websites, including

common stock for domestic and foreign investors, respectively. As domestic and foreign investors are exposed to different media environments (e.g. different degrees of media censorship), they may trade differently the two classes of shares, which carry identical cash flow rights. The different media exposure makes it possible for us to meaningfully compare stock pricing when there is a high degree of media censorship with stock pricing when there is little or no media censorship. Presumably, media censorship could be one possible explanation for the price gap between the dual classes of shares (i.e. the foreign share discount). Furthermore, the identical nature of both classes of shares allows us to conduct a relatively clean test of the net effect of media censorship on stock price. The foreign share discount puzzle in China is explained in detail in the following section.

In the early 1990s, China established two separate classes of stocks, one for Chinese domestic investors (A-shares) and another for foreign investors (B-shares).[4] Firms can issue both types of shares on domestic stock exchanges, but foreign (domestic) investors could only trade B-shares (A-shares) until 2001. B-shares have always been traded at a discount relative to A-shares, even since 2011, when Chinese domestic investors with foreign currency deposit accounts began to be allowed to invest in B-shares.[5] As Figure 1 shows, the average A-B share discount remains around 50%.[6] The puzzle still exists after the factors which were found to drive the discount in the literature have been substantially improved. These factors include the quality of corporate governance, illiquidity, difference in risk aversion and

Google (The Economist, April 2013). This greatly impairs the ability of local Chinese investors in China to access information from the websites of foreign newspapers.

[4] Chinese firms can also issue H shares on the Hong Kong Stock Exchange, but before November 2014 domestic investors were not allowed to directly invest in the Hong Kong market. Since November 17, 2014, Mainland and Hong Kong investors can directly invest in the Shanghai and Hong Kong markets through the "Pilot Program of an Interconnection Mechanism for Transactions in the Shanghai and Hong Kong Stock Markets". In this study we focus on the price difference between A-shares and B-shares.

[5] As the holding of foreign currency is subject to strict exchange control in China, B-shares are still largely held by foreign investors (Tan, 2011; Hou and Lee, 2014).

[6] The drops in 2001 and 2006 were attributed to the reduced information asymmetry (Chan et al., 2008) and Split Share Structure Reform (Hou and Lee, 2014).

differential demand elasticity (Bailey, 1994; Brennan and Cao, 1997; Fernald and Rogers, 2002; Chan et al., 2008; Mei et al., 2009; Tong and Yu, 2012). In addition, some prior studies (e.g. Chakravarty et al., 1998) argue that foreign investors have an information disadvantage due to language barriers and the difference between domestic and international accounting practices. Consequently, foreign investors require a higher rate of return to compensate for the high information risk, leading to B-shares being priced at a discount. Although the foreign share discount is a widely studied puzzle in the literature, the evidence on why the puzzle originates and persists is far from conclusive. This study intends to provide a new explanation of the puzzle based on the media censorship in China.

The role of the media as an information channel in the financial market has been studied extensively. However, the impact of an important institutional feature, media censorship, on stock price has received limited attention. Although the Chinese government has gradually relaxed its tight control over domestic and international information flow in order to facilitate its economic reform since 1978, in the absence of laws that protect the freedom of the press in China, the government still has an overwhelming influence on the media. For example, commercial newspapers remain state-owned, and newspapers must have sponsorship from a government unit in order to obtain a license. Furthermore, the government continues to control major newspapers by maintaining ultimate power to appoint or dismiss senior editorial staff. These mechanisms ensure that the reporting policies and editorial practice of newspapers are aligned with the objectives of the government. Therefore, Chinese newspapers, which are considered to be under tight government control, serve the government's political agenda.

A major consequence of the state ownership and control in the Chinese media is that negative news tends to be censored, because the government has a strong incentive to suppress the release of bad news to maintain social and economic stability (Piotroski, Wong and Zhang, 2015). For example, some news websites are regulated such that negative news (including business news) accounts for no more than 30% of all news.[7] Some previous studies (Chakravarty et al., 1998; Cumming et al., 2016) suggest that the tight control over the Chinese media has a significant influence over security pricing in China. The media control not only applies to sensitive political news but also to business news, to some extent. There are particularly strong incentives for the Chinese government to exert control over news related to firms with B-shares, since all of these firms were carefully selected by the government and they are the most important players in their respective industries. In fact, most of them were so-called "state-owned key enterprises" before going public (Chen et al., 2001). The performance of these firms could have a significant impact on economic growth and social stability (e.g. employment). As a result, the tightly controlled Chinese media tends to paint a rosy picture of these firms compared with its English counterpart. In contrast, the English media is not likely to suppress negative news about Chinese firms. The relatively more negative tone in the English media may lead B-share investors to trade down the B-share price of cross-listed firms, thus resulting in a larger foreign share discount. In addition, the great divergence between the tone of news reports in Chinese and English media implies more information uncertainty for cross-listed firms; therefore, B-share investors will demand a return premium for their investment. Thus, we predict that a greater divergence in the tone of news reports, as reflected by a high ratio of good to bad news reported in Chinese and English media, is associated with a larger A-B share discount for cross-listed firms, *ceteris paribus*.

[7] See http://www.cnhubei.com/xwzt/2011/wmwz/gzjy/201207/t2133513.shtml (in Chinese)

To perform our analysis, we collect news from mainstream Chinese and English newspapers and conduct an experiment in which participants are asked to read news related to public firms and categorise it as "good", "bad" or "neutral", based on their perception. Then we analyse whether the divergence of favouritism of news between Chinese and English media could explain the A-B share discount. The empirical analysis confirms our prediction. First, we find that the Chinese media, in general, is more positive about firms with dual classes of shares than the English media, and we report evidence that a foreign share discount could result from such a higher level of favouritism in Chinese news relative to English news. In particular, our results show that the foreign share discount is significantly greater among firms with a larger number of Chinese good news reports, all else being equal. This is consistent with A-share prices being higher when more favourable news is reported by Chinese newspapers, leading to a larger difference between A-share and B-share prices. Second, we find that the foreign share discount is greatest when both the number of Chinese good news reports and the number of English bad news reports are higher. As more Chinese good news could result in an increase in A-share price, and more English bad news could result in a decrease in B-share price, all else being equal, the foreign share discount could be greatest when both effects work concurrently. Third, we report a significantly positive correlation both between the number of English bad news reports and B-share investors' attention, and between the number of Chinese good news reports and A-share investors' attention, using the Google search volume index (SVI) of a listed firm as the proxy for investors' attention. This finding confirms that investors do pay attention to news, which is the important condition on which our argument hinges. Finally, we find that the positive association between the level of foreign share discount and the divergence in the ratio of good to bad news between Chinese news and English news is more pronounced in firms with a high level of analyst following. Given that firms disclosing more information usually have a

higher level of analyst following (e.g. Lang and Lundholm, 1996), we could expect that the media has a stronger influence on these firms' share prices, as news about these firms could attract more attention from investors due to the improved information environment. These findings are robust to controlling for other determinants of foreign share discount and region, industry, and firm and year fixed effects.

Our study contributes to two important streams of the literature. We add to the growing literature on media ownership and control (e.g. Djankov et al., 2003; Houston et al., 2011; Gehlbach and Sonin, 2014) and extend the focus from corporate governance to price implication. We provide evidence that media censorship significantly affects stock price, and a lack of press freedom has important implications for the capital market and foreign stock investments. Media censorship also has an unfavourable impact on capital allocation decisions among foreign (B-share) investors. To the best of our knowledge, we are the first to document the undesired economic consequence of a lack of press freedom in the context of foreign investments. Second, we shed light on the long-lasting foreign share discount puzzle in China (Chan et al., 2008; Fernald and Rogers, 2002) by providing empirical evidence of how news perception is manipulated by media censorship, thus offering a new explanation of the puzzle.

The reminder of the paper is organised as follows. Section 2 provides the institutional background and reviews the literature. Section 3 explains our approach to quantifying the tone of the news in this paper. Section 4 describes the sample selection process and presents the descriptive statistics. Section 5 discusses the results of our main specifications for the impact of media favouritism on the A-B share discount. Section 6 presents additional analyses and robustness tests. The last section concludes.

2. Institutional background and the literature

2.1 Newspapers in China

The Chinese media has long been seen as the "mouthpiece" of the Chinese Communist Party (CCP) and a propaganda tool under the Central Propaganda Ministry. During the period of 1949-1976, all news media in China was either directly funded by the government or indirectly funded by the government through forced subscriptions. The state's ultimate ownership of news media enabled the CCP to control the media effectively (Yue and Gong, 1997). As many studies on news media show, when newspapers are controlled by an authoritarian government, the government's incentive to achieve political goals and the lack of competition from independent news sources could result in biased news reporting (Tullock, 1987). In China, the tight control of the news media enables the government to employ it as a tool to generate positive propaganda while suppressing negative news.

From the late 1970s to the late 1990s, the Chinese media went through a period of liberalisation, as China's economic reform transformed economic and social structures. However, most non-Party publications arising from such liberalisation were absorbed into Party-sponsored publications during the 2003 media reform orchestrated by the Chinese government to consolidate existing newspapers into commercialised news groups based on locality (Qinglian, 2004). In general, the Chinese government has managed to continue to effectively control the news media and introduce an upward bias (i.e. more positive news) in news reporting with the intention of furthering its political agenda through various mechanisms. First, all newspapers must be registered under state or party organisations and are subordinated to a local sponsoring government unit. This mechanism worked even more effectively after the 2003 reforms, as the consolidation process created several large media

conglomerates, making central control of the media even easier (Hassid, 2008). In this sense, the conglomeration largely facilitates the central government's monitoring of the tone of the news media. Second, senior editorial staff members and top managers of most major newspapers are appointed directly by the Central Publicity Department (CPD) or the local propaganda departments of the government (Esarey, 2005). To secure their posts or seek promotion, top managers have strong incentives to encourage the production of positive news and filter out negative news. Third, journalists' compensation packages are designed in such a way that bonuses are directly linked to the number of articles they publish. Therefore, "there is a strong monetary incentive to toe the party line in order to ensure publication" (Hassid, 2008). In other words, journalists are induced to be risk-averse and are likely to produce more positive news than negative news in order to maximise their monetary compensation.

In brief, all these institutional, structural and monetary mechanisms allow the Chinese government to continue to exert tight control over the news media, even after a series of media reforms. It has been well documented that government-controlled media could distort information and provide upward biased views to entrench incumbent politicians, while independent media could supply relatively accurate news and unbiased views to the public (e.g., Djankov et al., 2003; Besley and Prat, 2006). Therefore, the tightly controlled Chinese news media is expected to generate more positive news than its independent foreign counterparts. In other words, the tone of Chinese news media is expected to be relatively more positive than English news media. Such upward bias embedded in Chinese news could also affect investors' processing of relevant information, and consequently have an influence on investors' valuation of stocks.[8] Therefore, it is pertinent to explore the effect of the divergence of tone between Chinese and English media on the prices of A- and B-shares.

[8] Hong et al. (2005) develop a model where agents use over-simplified/partial information to value stock while ignoring the true, more complex fundamental information, resulting in either overvaluation or undervaluation.

2.2 Setting of the Foreign Share Discount in China

Since the early 1990s, China's two stock exchanges in Shanghai and Shenzhen have experienced remarkable growth, but the Chinese stock market is still dominated by unsophisticated retail investors. Firms that issue A-shares could also issue B-shares in the domestic market, and B-shares are traded in Hong Kong dollars (US dollars) in Shenzhen (Shanghai). Since February 2001, mainland Chinese investors have been allowed to invest in B-class shares; foreign investors, however, are still subject to restrictions in investing in A-shares. Compared with A-shares, B-shares are always traded at a discount (Bailey, 1994; Fernald and Rogers, 2002). A number of studies provide theoretical and empirical explanation of the A-B share discount. For example, Bailey (1994) attributes the discount to the low expected return for domestic investors, because they have limited investment alternatives. Amihud and Mendelson (1986) propose that illiquid stocks usually have a higher expected return to compensate investors for the illiquidity risk. Because A-shares have been much more liquid than B-shares, B-shares are priced at a discount to compensate for the illiquidity risk. Another explanation of the puzzle is that there is information asymmetry between domestic and foreign investors. Chan, Menkveld and Yang (2008) use proprietary trading data to test the information asymmetry hypothesis for the A-B share discount puzzle. They use the market microstructure model to construct information asymmetry measures, and find such measures can explain a significant amount of cross-sectional variation in the A-B

For example, investors of A-shares might make persistent forecast errors while neglecting pertinent information signals (i.e. negative news due to media censorship), leading to a lower expected rate of return for their investment and therefore an overvaluation (which is reflected by the higher A-share price). Furthermore, Barber et al. (2009) indicate that individual investors' trading has a significant systematic component, suggesting that the biases of individual investors do not cancel out in aggregate. This may help to justify the persistence of the A-B share price difference.

share discount. A recent study by Tong and Yu (2012) offers a corporate governance explanation for the A-B share discount. The authors find that the A-B share discount is larger for firms with weaker governance, characterised by higher ownership concentration by controlling shareholders, less effective boards and lower dividend payout. They conclude that, compared with domestic investors, B-share investors care more about the quality of corporate governance and therefore demand a return premium for firms with inefficient governance.

On 19th February 2001, the China Securities Regulatory Commission (CSRC) and the State Foreign Exchange Administration Bureau (SAFE) announced that starting from 28th February 2001, domestic investors who have foreign currency deposit accounts in domestic banks could also invest in B-shares. Before the opening up of the B-share market to local investors, the average A-B share discount was 72% (Tong and Yu, 2012). Although the discount decreased after 2001, it continues to exist and has actually widened in recent years. Mei et al. (2009) run empirical tests based on the theoretical model developed by Scheinkman and Xiong (2003), and they show that the price premium of A-shares persists after 2001 because there are too many speculative traders who are concerned with short-term trading profit in the A-share market. Therefore, they argue that such a premium could be partially induced by the speculative trading behaviour. Their findings echo the conclusion in a formal report issued by the OECD, which states that "share prices (in China) are not well-connected with corporate results. The market has been marred by speculation and market manipulation" (OECD, 2001). To summarise, evidence on the origin and persistence of the A-B share discount remains inconclusive.

2.3 Media coverage and stock prices

There is a growing body of literature supporting the idea that the media plays a crucial role in asset pricing, as the media helps distribute information to a large audience. For example, Fang and Peress (2009) report that stocks with no newspaper coverage earn significantly higher future returns than those that are heavily covered, after controlling for size, market-to-book ratio, momentum and liquidity. They conclude that media coverage facilitates information diffusion, provides credible information to a broad audience and therefore enables the firm to be better recognised by investors, indicating that investors require lower returns. Engelberg and Parson (2011) analyse the earnings announcements of S&P 500 index firms, and they find that local media coverage has a strong impact on local trading in various US cities. Using a national newspaper strike as an exogenous event to investigate the causal link between media coverage and stock market behaviour, Peress (2014) reports that the trading volumes, the dispersion of stock returns and intraday volatility decrease significantly on strike days. The findings suggest that the media improves the efficiency of stock markets through facilitating the dissemination of information among investors.

Another strand of literature focuses on the tone of media coverage. For example, Dougal et al. (2012) show that the identity (i.e. "bullishness" or "bearishness") of the columnists of *Wall Street Journal* reliably predicts next-day returns on the Dow Jones Industry Average. Their results suggest that the trading behaviours of investors could be heavily influenced by the bullish or bearish sentiment conveyed by columnists. Researchers also explore the role of media optimism/pessimism in financial markets. For example, Tetlock (2007) reports that pessimism in media has strong predictive power for downward pressure on stock prices, and Tetlock et al. (2008) further show that the amount of negative words in news stories also forecasts earnings performance. Carey et al. (2016) also show that the tone of news significantly affects first-day pricing of IPOs in Australia. Regarding the

economic consequence of press freedom, using an international setting, Kim et al. (2014) find that a lack of press freedom is associated with the reduced ability of stock price to incorporate firm-specific information and predict future earnings.

3. News perception

This section describes the perception-based method used in classifying news in our study. A brief review of the existing methods used in the finance literature is given before introducing the rationale and the details of our method.

3.1 Existing methods and drawbacks

There are several widely used methods of distinguishing good news from bad in the finance literature. One of the most popular methods is to compare the observed disclosure with investors' expectations and classify news as good (bad) when the observed value is higher (lower) than the expected value. This method is utilised in studies on earnings announcements (Patell and Wolfson, 1982; Conrad et al., 2002; Basu, 1997; Yermack, 1997; Skinner, 1994). However, the expectation-based method can only be used to analyse selected types of news, including earnings or dividend announcements. Another method is to use concurrent positive or negative stock returns around news announcements to categorise good or bad news (Engle and Ng, 1993; Jindrichovska and Mcleay, 2005). The stock-return-based method has an underlying assumption that abnormal returns are due solely to the news under study (Patell and Wolfson, 1982). Classifying news as good or bad using this method could be problematic when other news is released during the announcement event window of the news under study.

A number of previous studies employ computer-aided content analysis packages (e.g. Clatworthy and Jones, 2003; Tetlock, 2007; Tetlock et al., 2008; Malmendier and Tate, 2008; Kothari et al., 2009; Roger et al., 2011) or more advanced computational-linguistic methods (e.g. Antweiler and Frank, 2004; Li, 2010; De Franco et al., 2014) to code reports or news. For example, Clatworthy and Jones (2003) and Malmendier and Tate (2008) use a computer programme to extract news. Then they identify the tone of news or classify good and bad news by counting the number of positive and negative words, respectively. Tetlock (2007) and Tetlock et al. (2008) use an automated program, General Inquirer (GI), to identify the media tone by counting the number of words in each day's *Wall Street Journal* column that fall within different categories based on GI's IV-4 psychosocial dictionary. Building on research of the tools of computational linguistics content analysis, Antweiler and Frank (2004), Li (2010) and De Franco et al. (2014) employ a more advanced computational method, the Naïve Bayes computational process, to construct the proxy for the tone of the reports or news. This method can generate categorical predictions by aggregating the tone probabilities, which can increase the sample size compared with traditional coding methods.

However, there are also potential limitations associated with the computational-linguistic based measures of tone. These content analysis methods are prone to subjectivity in the analysis of narrative information, reports or news, as judgements and interpretations are usually inevitable during the process of defining positive and negative words (Clatworthy and Jones, 2003). Some computational processes (e.g. Naïve Bayes algorithm) introduce measurement errors, as acknowledged by De Franco et al. (2014). Furthermore, these content analysis based methods focus solely on information content and fail to consider the reception of the information, while a large body of literature shows that audience (i.e. the recipients of information) plays a very important role in processing information, and "individual frames" (Scheufele, 1999) may be used to interpret news.

3.2 Perception-based method

In order to avoid the problems associated with existing methods in the finance literature, in this study we employ a perception-based method that has been widely applied in media and communication research (Sundar, 1998; Sundar, 1999; Tewksbury and Althaus, 2000; d'Haenens et al., 2004). In this method, good or bad news is classified based on information recipients' perceptions. This sub-section describes the participants and the procedure of news collection and classification.

Participants

Seven Chinese students enrolled in the MSc programme in finance at Durham University (UK) participated in the experiment for their Master's dissertations. By the time they joined the experiment, they had finished all coursework for their MSc study and therefore had English language abilities and finance knowledge comparable to stock market investors. We did not offer payment because they used the collected data in their Master's dissertations.

Procedure

To examine Chinese and English language press coverage, we use four leading newspapers in Chinese and four in English. Chinese language business publications include *China Securities Journal*, Yangzi *Evening Post*, *Securities Times* and *First Financial Daily*. English language publications include *Financial Times*, *Wall Street Journal*, *China Daily* and *South China Morning Post*. The Chinese news articles are collected via China National

Knowledge Infrastructure (CNKI), while the English news articles are collected via Factiva. These newspapers were randomly allocated to the students. Students searched the Chinese (English) firm names for A (B) stocks' news and read the news stories online. Then they were asked to classify the news as good, bad or neutral, based on their perception. After identifying good and bad news, we count the number of good and bad news pieces reported in Chinese and English media. Next, we compute the ratio of good news to bad news for a given firm in Chinese and English media respectively, and then calculate the ratio of good vs bad news in Chinese media against good vs bad news in English media. The larger the ratio, the greater the divergence in the tone of news coverage between Chinese and English media.

Using this method, our classification of good or bad news reflects the readers' perception of the information. Compared with the expectation-based method, which only works for certain types of corporate disclosure (e.g. earnings announcements and dividend payment), the major advantage of this reader-perception-based method is that it allows us to study any type of news. In addition, our measure contains less noise than the stock-return-based measure in the sense that the label (i.e. "good" or "bad") perfectly matches each specific piece of news, whereas the label attached under the stock-return-based method could be misleading when there are multiple pieces of information released during a short event window, and it is difficult to conclude whether the change in stock price is due solely to the news under study. Our method could also circumvent the difficulty and subjectivity in defining positive and negative words in the content-analysis-based method. We are aware of the potential differences in readers' perception of online and print news, as the delivery method (i.e. print or online) of news might affect readers' estimates of a news story's accuracy and believability (Sundar, 1999; Tewksbury and Althaus, 2000). However, in our paper, the online news articles extracted from the platforms (CNKI and Factiva) are exactly the same as those in print newspapers in terms of both content and structure. Therefore, we

expect that the online news in our sample has a very similar level of accuracy to that in print newspapers. In addition, all our online news articles clearly quote the sources (i.e. the names of the newspapers), which could effectively ameliorate the concern over the difference in credibility between online and print news.

4. Sample selection and descriptive statistics

Our sample period covers 2004-2008. Some prior studies (e.g. Hou and Lee, 2014) suggest that the Split Share Structure Reform during the period 2005-2007 has a significant impact on the A-B share discount. To ensure consistency between the pre- and post-Split Share Structure Reform periods, we choose one year before the reform as our starting year and one year after the reform as the ending year of our sample period. We first identify all listed firms that have both A-shares and B-shares in the Shanghai and Shenzhen stock exchanges. Then we search for each of these cross-listed firms by name, and count the number of news articles about each firm. The search yields a total of 279,962 news reports about 88 firms during our sample period. Among these news reports, 100,185 reports are classified as good news, 4,738 reports are classified as bad news, and 175,039 reports are classified as neutral news.

We use the China Center of Economic Research (CCER) and Chinese Security Market and Accounting Research (CSMAR) databases to collect the data items for the computation of our variables. These items include market capitalization, stock turnover, state-control status, percentage of restricted shares, year of reform for each specific firm, stock return, return on assets, sales, debts, equity, debt-to-equity ratio, concentration of ownership, CEO shareholding, CEO-chairman status, number of independent directors, number of board

members, number of board meetings, industrial classifications and regions. In addition, we obtain Chinese domestic market returns from Datastream and US stock market returns from the Center for Research in Security Prices (CRSP). We also winsorize the top and bottom 1% of all non-dummy variables in order to deal with outliers. We require all of the variables to have valid values. Our final sample consists of 4,218 firm-month observations of 86 firms. There are 239,393 news reports (238,353 Chinese news and 1,040 English news) about these firms.

Panel A of Table 1 presents the descriptive statistics of our variables. The monthly A-B share discount (ForeignDiscount) is 43.66% on average over our sample period. The ratio of Chinese language good to bad news over the ratio of English language good news reports (RGB_NEWS) is 20.39%, indicating that the news coverage available to A-share investors is, on average, 20.39 (i.e. 20.39% multiplied by the scale factor 100) times more positive than that to B-share investors for the same firm.[9] The average number of Chinese language good news reports (CGNEWS) is 0.2005, while that of Chinese language bad news reports (CBNEWS) is only 0.0096. The big gap also shows the significant asymmetry in good and bad news reports in Chinese media and indicates that there is a very high level of positivity in Chinese news media. As Chinese media is virtually owned by the state, the descriptive statistics may suggest that the Chinese government censors negative news in order to maintain social and economic stability. The average number of English language good news reports (EGNEWS) and English language bad news reports (EBNEWS) is 0.14 (i.e. 0.0014

[9] It should be noted that B-share investors also include some Chinese investors who have bought B-shares since the B-share market opened up to domestic investors. However, these Chinese investors are very different from those A-share investors in terms of information channels. As the B-share market is only open to domestic investors who hold foreign currency accounts, Chinese B-share investors must have either business or personal connections with foreign countries. Due to holding foreign currencies and their foreign connections, they usually have both a strong incentive to search for English news and the channels through which they can access English media. Therefore, these Chinese B-share investors could be very similar to foreign B-share investors in terms of their information acquisition. Furthermore, the B-share market is still largely dominated by foreign investors, as domestic investors are restricted by the limits of their access to foreign currencies due to the tight currency control in China (Tan, 2011).

multiplied by the scale factor 100) and 0.03 (i.e. 0.0003 multiplying the scale factor 100), respectively. Although there are also more positive news reports than negative news reports in English news media, the gap between them is much narrower compared with Chinese news media. In addition, it should be noted that the mean and the median of StateControl are 0.793 and 1, respectively, indicating that the majority of the dual-listed firms in our sample are state-owned firms. This sample characteristic would allow us to better capture the media influence, in that state ownership may bring about more media favouritism.

Panel B presents the total number of news reports and the ratio of good to bad news in Chinese and English news media, respectively. The average of the total number of Chinese language news reports (i.e. Chinese good and bad news reports) is 56.5085, while that of English language news reports is only 0.2466. The big difference shows that these dual-listed firms receive more Chinese media coverage than English media coverage, on average. In addition, Panel B also shows that the ratio of Chinese good to bad news (21.0126) is much higher than English good to bad news (1.1226), which suggests that, on average, Chinese news reports about dual-listed firms are more positive than English news reports.

Panel C presents the proportion of good, bad and neutral news reports in Chinese news, in English news and in all news (i.e. Chinese news and English news combined), respectively. We observe that the average proportion of neutral news reports in Chinese news is 59.48%, much higher than that in English news (22.4%). The average proportion of bad news reports in Chinese news (4.35%) is much lower than that in English news (36.16%). Although the average proportion of good news reports in Chinese news (4.35%) is also lower than that in English news (60.45%), the ratio of the average proportion of good news reports to bad news reports in Chinese news (0.3616/0.0435≈8.31) is much higher than that in

English news (0.6045/0.1714≈3.53). This suggests that Chinese news is relatively more positive than English news on average. We also show how these proportions change over our sample period, on average, in Figure 2. Specifically, Figure 2 (a) shows the average proportion of good, bad and neutral news reports in Chinese news by month. Figure 2 (b) shows the average proportion of good, bad and neutral news reports in English news by month. Figure 2 (c) shows the average proportion of good, bad and neutral news reports in all news (i.e. Chinese news and English news combined) by month. The solid line, the dotted line and the fine line represent good news, bad news and neutral news, respectively.

5. Media control and foreign share discount

5.1 Favouritism in news and foreign share discount

The English media is considered to be more independent, as they are not subject to the intervention of the Chinese government, while the Chinese media tends to lack independence and issues more positive news. Thus, we predict that the positive biased tone of news coverage of Chinese and English media as reflected by the ratio of good to bad news reported in Chinese and English media could lead to a larger foreign share discount. To test the prediction, we use the following regression model:

$$\begin{aligned} ForeignDiscount_{i,t} = {} & \alpha_0 + \alpha_1 RGB\_NEWS_{i,t} \\ & + \alpha_2 RelativeMV_{i,t-1} + \alpha_3 RelativeTO_{i,t-1} + \alpha_4 StateControl_{i,t-1} + \alpha_5 Reform_{i,t} + \\ & \alpha_6 RelativeRET_{i,t-1} \\ & + \alpha_7 Beta_{i,t-1} + \alpha_8 FSI_{i,t-1} + \alpha_9 ROA_{i,,t-1} + \alpha_{10} SalesGrowth_{i,t-1} + \alpha_{11} TobinQ_{i,t-1} + \alpha_{12} \\ & Leverage_{i,t-1} \\ & + \alpha_{13} OwnershipC_{i,t-1} + \alpha_{14} CHOLD_{i,t-1} + \alpha_{15} CDUAL_{i,t-1} + \alpha_{16} BINDP_{i,t-1} + \alpha_{17} BSIZE_{i,t-1} \\ & + \alpha_{18} BMEET_{i,t-1} + Region + Industry + Firm + Year + \varepsilon_{it} \end{aligned} \quad (1)$$

We also explore whether a certain type of news (i.e. Chinese/English good/bad news) affects the foreign share discount in the following regression model:

$$\begin{aligned} ForeignDiscount_{i,t} = {} & \beta_0 + \beta_1 CGNEWS_{i,t} + \beta_2 EBNEWS_{i,t} \\ & + \beta_3 RelativeMV_{i,t-1} + \beta_4 RelativeTO_{i,t-1} + \beta_5 StateControl_{i,t-1} + \beta_6 Reform_{i,t} + \beta_7 RelativeRET_{i,t-1} \\ & + \beta_8 Beta_{i,t-1} + \beta_9 FSI_{i,t-1} + \beta_{10} ROA_{i,t-1} + \beta_{11} SalesGrowth_{i,t-1} + \beta_{12} TobinQ_{i,t-1} + \beta_{13} Leverage_{i,t-1} \\ & + \beta_{14} OwnershipC_{i,t-1} + \beta_{15} CHOLD_{i,t-1} + \beta_{16} CDUAL_{i,t-1} + \beta_{17} BINDP_{i,t-1} + \beta_{18} BSIZE_{i,t-1} \\ & + \beta_{19} BMEET_{i,t-1} + Region + Industry + Firm + Year + \varepsilon_{it} \end{aligned} \quad (2)$$

In our regression models, the dependent variable, $ForeignDiscount_{i,t}$, represents the discount in B-shares of firm *i* at the end of month *t*. It is defined as the price of A-shares minus the price of B-shares divided by the price of A-shares. According to this definition, the higher the value of $ForeignDiscount_{i,t}$, the greater the foreign share discount. We use the key independent variables $RGB\_NEWS_{i,t}$ in Equation (1) and $CGNEWS_{i,t}$ and $EBNEWS_{i,t}$ in Equation (2). $RGB\_NEWS_{i,t}$ is the ratio of Chinese language good to bad news over the ratio of English language good to bad news, divided by 100. The ratio of Chinese (English) language good to bad news is the number of Chinese (English) good news reports over the number of Chinese (English) bad news reports. Based on this definition, a higher value of $RGB\_NEWS_{i,t}$ indicates relatively more positive news exposure of A-share investors relative to that of B-share investors of the same firm. $CGNEWS_{i,t}$ and $EBNEWS_{i,t}$ in Equation (2) are defined as the number of Chinese good news reports divided by 100 and the number of English bad news reports divided by 100, respectively.[10]

[10] The number of Chinese bad news reports (i.e. CBNEWS) and the number of English good news reports (i.e. EGNEWS) are not included in the regression, because the high correlation between CGNEWS and CBNEWS and the high correlation between EBNEWS and EGNEWS could result in the problem of the multicollinearity.

Our regression models also include four groups of control variables. The first group of variables is used to consider information asymmetry (Chan et al., 2008), market liquidity (Chen et al., 2001), ownership structure (Hou and Lee, 2012) and investor speculation (Mei et al., 2009), as they are discussed in prior research as potential explanations for the Chinese foreign share discount. $RelativeMV_{i,t-1}$ is defined as the market capitalization of A-shares divided by that of B-shares at the end of the previous month. As the size of firms is generally believed to be negatively related to information asymmetry, firms with large relative size of A-shares to B-shares, measured by market capitalization, could have higher levels of information asymmetry between A-share investors and B-share investors. $RelativeTO_{i,t-1}$ is defined as the turnover of A-shares divided by that of B-shares at the end the previous month. This ratio is used to control for the relative liquidity of A-shares to B-shares. $StateControl_{i,t-1}$ is a dummy variable equal to 1 if a firm is state-controlled, and 0 otherwise. $Reform_{i,t}$ is a dummy variable equal to 1 for the year of and the years after Split Share Structure Reform, and 0 for the years before this reform. Prior studies suggest that majority shareholders and outside minority shareholders are likely to have a higher level of conflict of interest in state-controlled firms and before the reform. $RelativeRET_{i,t-1}$ is defined as the stock returns of A-shares divided by that of B-shares in the previous month. Prior studies show that high past returns could increase speculation activities. Including this variable in our regressions could help us control for the relative movement between the price of A-shares and that of B-shares.

Our second group of control variables consists of the factors related to equity cost of capital. $Beta_{i,t-1}$ is used to control for the systematic risk of a firm and is defined as the beta in CAPM in the previous year. We estimate it by regressing the daily excess return of each firm on daily excess returns of the market for the past year. $FSI_{i,t-1}$ is used as a proxy for the change in the firm-specific information environment. It is defined as the change in the

residual variance of the informativeness of share price in the previous year. Following the method employed in Fernandes and Ferreira (2008), we first obtain the R-square (i.e. goodness of fit) by regressing the weekly excess returns of each firm on both Chinese and US weekly market excess returns. We then calculate the natural log of the ratio of (1-R-square) to R-square as the value of this variable. $ROA_{i,t-1}$ represents the return on assets based on industry median adjustment in the last fiscal year. This is used as the measure of a firm's profitability and defined as the ratio of operating income to total assets. $\Delta SalesGrowth_{i,t-1}$ is defined as the change of sales growth in percentage in the last fiscal year. It is used to control for the growth on the demand side. $TobinQ_{i,t-1}$ represents the Tobin's Q of the firm and serves as a proxy for firm performance. It is calculated as the ratio of the sum of debt and market value to total equity in the last fiscal year. $Leverage_{i,t-1}$ is the ratio of debt to equity of the last fiscal year. It is used to control for financial distress.

Our third group of control variables consists of the factors related to the quality of corporate governance. Prior studies (Lombardo and Pagano, 2002; Tong and Yu, 2011) show that governance has a significant impact on equity cost capital and could help explain the Chinese foreign share discount. $OwnershipC_{i,t-1}$ represents the concentration of ownership in the last fiscal year. We measure the concentration by using the Herfindahl index, which considers the holdings of the firm's ten largest shareholders. $CHOLD_{i,t-1}$ is a dummy variable equal to 1 if the shareholding of a CEO in a firm fell in the top 25 percent or the bottom 25 percent of cross-sectional shareholdings of CEOs in the previous year, and 0 otherwise.[11] This variable is used to control for the effects of potential agency problems, as prior studies show that high CEO ownership may lead to managerial entrenchment, while low CEO ownership may result in the insufficient alignment of CEOs' and shareholders' interests. $CDUAL_{i,t-1}$ is a dummy

[11] As a robustness check, we also use the raw value of the proportion of shares held by the CEO instead of the dummy variable (CHOLD) to run regressions in Equations (1) and (2). The results are essentially unchanged, as shown in Appendix D.1 and Appendix D.2.

variable equal to 1 if the CEO of a firm was also the board chair in the last fiscal year, and 0 otherwise. Boards tend to have relatively less monitoring power when the CEO of the firm also sits on the board as the chair. $BINDP_{i,t-1}$ is a dummy variable equal to 1 if the proportion of independent directors on the board was higher than the cross-sectional median proportion in the last fiscal year, and 0 otherwise. Prior studies show that independent directors usually play a more effective role in monitoring managers. $BSIZE_{i,t-1}$ is a dummy variable equal to 1 if the board size of a firm in the last fiscal year was larger than the cross-sectional median board size, and 0 otherwise. $BMEET_{i,t-1}$ is a dummy variable equal to 1 if the number of board meetings of a firm in the last fiscal year was greater than the cross-sectional median number of board meetings, and 0 otherwise. The higher frequency of board meetings might indicate more active monitoring of a board. We also consider firm, year and month fixed effects in our regressions.

Table 2 presents the regression analyses of the test. Regression 1 shows that after controlling for firm and year fixed effects, the coefficient of RGB_NEWS is significantly positive (coef. = 0.0076, t = 2.01). After controlling for other determinants of foreign share discounts, the coefficient of RGB_NEWS is still significantly positive in Regressions 2 and 3. We also add month fixed effects in Regression 4 and 5, and the coefficients and significance levels are essentially unchanged. The results suggest that the fact that Chinese news is more positive than English news contributes to the foreign share discount puzzle. The divergence of tone in the news media seems to have a significant impact on A-share and B-share prices, consistent with Tetlock (2007, 2008). Specifically, due to tight government control, Chinese media is relatively more reluctant to report negative news than English media, which could lead A-share investors to be more optimistic about a firm than B-share investors and thus trade up the A-share price. By contrast, foreign media is considered to be more objective and

more likely to report negative news than Chinese media, which could lead B-share investors to be more pessimistic about a firm than A-share investors and thus trade down the B-share price. Therefore, the divergence of tone in the media could increase the difference between A-share and B-share prices and, consequently, lead to a larger foreign share discount. Our finding provides an alternative/complementary explanation for the foreign share discount puzzle, showing that not only the levels of news coverage, as suggested by Cumming et al. (2016), but also the tone of news media is important in explaining the foreign share discount.[12]

The coefficients of most control variables are largely in line with the findings in prior studies. In particular, across Regression 2 to Regression 5, we find significant positive coefficients for both RelativeMV and RelativeTO, which suggests that firms with higher levels of information asymmetry (Chan et al., 2008) and lower levels of liquidity (Chen et al., 2001) are likely to have higher discounts in their B-shares. Consistent with Hou and Lee (2012), we also find a significant positive coefficient for StateControl[13] and a significant negative coefficient for Reform, which suggests that more conflicts of interest between majority shareholders and minority shareholders could lead to a higher discount in B-shares. In addition, we report that the coefficients of Beta and OwnershipC are significantly positive, and the coefficient of ROA is significantly negative in Regression 3 and Regression 4. These results suggest that the higher foreign share discount of a firm could be associated with higher exposure of systematic risks, higher ownership concentration and lower profitability.

[12] To examine whether our results are distorted by the firm-month observations in which there is no English news, we remove those observations and rerun the parallel regressions. Our results are robust to the exclusion of those observations.

[13] To further examine whether media censorship plays a larger role in state-controlled firms in explaining the foreign share discount, we split the full sample into two subsamples, state-controlled firms and non-state-controlled firms. Then we run regressions using Equation (2) for both subsamples, respectively. We find that the coefficient of RGB_NEWS is only significant in the state-controlled subsample, and not in the non-state-controlled subsample, as reported in Appendix C.

5.2 The number of good vs bad news reports

Our result in Table 2 shows a significant positive association between the relative positivity of Chinese media to English media, as measured by RGB_NEWS, and foreign share discount. In this section, we further explore whether this relation is mainly driven by Chinese good news or English bad news, by using Equation (2) to run regressions. Table 3 presents the regression results. We find that the coefficients of CGNEWS (i.e. Chinese good news) are significant and positive across Regression 1 to Regression 6. In particular, the coefficient of CGNEWS is significantly positive (coef. = 0.0079, t = 1.79), after controlling for firm and year fixed effects in Regression 1.[14] This result is in line with our findings in Table 2, suggesting that more Chinese good news could result in a higher A-share price and, consequently, the gap between A-share price and B-share price would widen (i.e. there would be a larger foreign share discount), *ceteris paribus*. In Regression 2, we include in our model a comprehensive set of control variables to control for firm-specific characteristics and other possible explanations. The result shows that the coefficient of CGNEWS is even higher and more significant (coef. = 0.0085, t = 3.16) than in Regression 1. When we further add firm and year fixed effects, the coefficient of CGNEWS is still significantly positive (coef. = 0.0071, t = 1.85), although the magnitude and the significance level decrease slightly, as shown in Regression 3. On the other hand, we find the signs of the coefficients of EBNEWS (i.e. English bad news) are positive across all specifications, although not statistically significant. The positive signs are consistent with our prediction that more English bad news

[14] In Appendix E, we also present the results of the regressions based on the unscaled CGNEWS and EBNEWS (i.e. unscaled by 100). The coefficient of CGNEWS in Regression 1 is 0.0001 (sig. at 10% level), suggesting that the increase of one Chinese good news report is associated with a one basis point increase in the foreign share discount.

could result in a lower B-share price and, consequently, the gap between A-share price and B-share price would widen (i.e. there would be a larger foreign share discount), *ceteris paribus*.

After examining the impact of Chinese good news and English bad news, respectively, we further investigate the potential joint effect of both types of news on foreign share discount. To conduct the test, we include an interaction term, CGNEWS*EBNEWS, in Equation (2) and run the regressions. Interestingly, we find that the coefficient of the interaction term is significantly positive (coef. = 2.035, t = 2.32) in Regression 4. It should be noted that when including all fixed effects in Regression 7, the coefficient of the interaction term is still significant, although the coefficient of CGNEWS loses significance. This result suggests that the positive association between the number of Chinese good news reports and the foreign share discount is strongest when the number of English bad news reports is greater. In other words, a greater number of Chinese good news reports may result in an increase in A-share price, and a greater number of English bad news reports may result in a decrease in B-share price; when both effects work concurrently, the foreign share discount is expected to be the greatest. Our result is consistent with this expectation. The result is similar when we run parallel regressions with firm, year and month fixed effects.

Taking the results together, we find evidence that more Chinese good news and more English bad news are both associated with a greater foreign share discount; and the positive Chinese media seems to play a larger and more significant role in explaining the foreign share discount. Moreover, our results suggest that the joint effect of both types of news could result in the widest gap between A-share price and B-share price and, consequently, lead to the greatest foreign share discount.

6. Additional analysis and robustness tests

6.1 Investors' attention

Previous sections discuss the impact on the foreign share discount of the divergence in tone between Chinese and English news. The underlying assumption of this association is that investors do pay attention to media coverage. As argued by Kahneman (1973), investor attention is a scarce cognitive resource, and investors have limited attention. Since the market is constantly exposed to all types of media coverage and news, it is important to establish the link between media coverage and investors' attention. Without investors paying sufficient attention or considering the news in their assessment of asset allocation, it is difficult for the media to play a role in security pricing and to conclude that the association between a certain type of media coverage and security price is meaningful (Da et al., 2011). In our study, it is particularly important to take investors' attention into consideration when examining the impact of the tone of news reports on stock returns in the Chinese stock market. As the Chinese media is under tight government control, it is unclear and undocumented in the literature whether investors pay any attention to the news in general or to a particular type of news (such as good versus bad news) reported in the Chinese media. The argument that the divergence in the tone of news coverage between Chinese and English media could result in the gap between A-share price and B-share price hinges on the condition that investors do pay attention to news. In other words, investors could only respond to news reports if they pay attention to them. Furthermore, although prior research documents evidence on the correlation between news and the movement in security prices (e.g. Skinner and Sloan, 2002), there is a missing link in the documented correlation – whether certain types of news attract more investor attention than others. The test of such correlation is important, as investors' responses are not only related to their news exposure (i.e. the number and tone of news

reports) but also depend on how much attention they pay to different types of news (i.e. Chinese/English good/bad news). Therefore, in our study we specifically examine investor attention to Chinese/English good/bad news, respectively.

Following Da et al. (2011), who first proposed the measure, we use the Search Volume Index (SVI) as an ex post measure of investors' active attention. The rationale is, if an investor is searching for a firm, it is clear that the investor is paying attention to that firm. Some recent studies (e.g. Da et al., 2011; Drake et al., 2012; Andrei and Hasler, 2014; Vozlyublennaia, 2014; Ding and Hou, 2015) show that SVI is correlated with other measures of investor attention and captures investor attention in a more timely manner than other measures. Moreover, SVI predicts stock prices in two weeks' time and their reversals, and is correlated with various price indexes. Our data source for SVI is Google Trends, which provides the frequency of search terms, dating back to January 2004. SVI for a search term is calculated as the number of searches for that term scaled by its time-series average. For our study, we identify search frequencies by the Chinese and English names of our sample firms, respectively, in Google Trends (https://www.google.com/trends/). We download the weekly SVIs for individual stocks, and then convert the weekly SVIs to monthly sum SVIs by aggregating the weekly SVIs in each month. We also calculate the average and the median of the weekly SVIs in each month. Finally, the sum, the average and the median SVIs are scaled by 100.

Table 4 presents the correlations of A-share (B-share) investor attention with Chinese (English) language good and bad news under firm and year fixed effects controls. We use the sum, the average and the median Chinese (English) SVI as the proxy for A-share (B-share) investor attention. The results in Panel A show that Chinese good news coverage is

significantly positively correlated with the sum (coef. = 0.1739, sig. at 1%), the average (coef. = 0.0401, sig. at 1%) and the median (coef. = 0.0396, sig. at 1%) level of attention from A-share investors. On the other hand, there is no significant correlation between Chinese bad news coverage and the level of attention from A-share investors. These findings may suggest that A-share investors are heavily influenced by the positive tone of Chinese media and pay more attention to good news than to bad news. Consequently, the extremely high level of attention of A-share investors to good news could result in their over-reaction to good news. This is consistent with our finding in Table 3 that, all else being equal, a larger number of Chinese good news reports widen the gap between A-share and B-share price (i.e. increase the foreign share discount), as A-share investors tend to pay more attention to and over-react to good news.

By contrast, the results in Panel B show that English bad news coverage is significantly positively correlated with the sum (coef. = 20.7203, sig. at 5%), the average (coef. = 4.2445, sig. at 5%) and the median (coef. = 4.1698, sig. at 5%) level of attention from B-share investors, but there is no significant correlation between English good news coverage and the level of attention from B-share investors. The results indicate that B-share investors pay more attention to bad news, which could lead to their over-reaction to bad news. One possible explanation for B-share investors' high level of attention to bad news is that they are likely to be heavily influenced by the general tone of English media. As shown in Panel B of Table 1, English media is much less positive (i.e. relatively more negative) about Chinese cross-listing firms than Chinese media, on average. Therefore, bad news could attract more attention from B-share investors than good news, given the relatively negative tone of the English media. Furthermore, B-share investors could find bad news more salient than good news, due to their relatively high degree of loss aversion, a key feature of prospect theory

(Kahneman and Tversky, 1979), whereas A-share investors are less likely to have a high degree of loss aversion due to the home bias (Graham et al., 2009). Because of their loss aversion, B-share investors care more about losses than gains, even if they are of the same magnitude. B-share investors may even be concerned about unknown problems, because the released bad news could be the "tip of the iceberg". Such concern may result in a large drop in B-share price. Therefore, English bad news could have a stronger impact on the share price of cross-listed firms than English good news.

In brief, the results presented in Panels A and B of Table 4 suggest that good news attracts more attention from A-share investors, whereas bad news attracts more attention from B-share investors. Consequently, A-share investors are likely to over-react to Chinese good news and B-share investors are likely to over-react to English bad news, which could increase the gap between A-share and B-share price (i.e. increase the foreign share discount). These findings provide supporting evidence of the link between media coverage and investor attention, and they highlight the possible channels (i.e. Chinese good news and English bad news) through which the tone of media is likely to have an impact on the foreign share discount.

6.2. Information asymmetry

As discussed in previous sections, the information asymmetry between Chinese media and English media could help explain the foreign share discount. However, previous studies (Frieder and Subrahmanyam, 2005; Yohn, 1998; Cumming et al., 2016) show that analyst following might mitigate the effect of such information asymmetry. Financial analysts regularly generate analyst reports on the performance of the firms they follow, which provide

additional/alternative information about the firms to investors. Analyst reports are usually believed to be more informative and credible, as financial analysts are more knowledgeable about the firms than journalists. Therefore, investors are likely to rely more on analyst reports and less on news media whenever analyst reports are available. Thus, the effect of the information asymmetry in news media is expected to be less pronounced among firms with greater financial analyst following.

Therefore, we conduct an additional analysis to examine whether analyst following has an impact on the relationship between the divergence in the ratio of good to bad news between Chinese and English media and the foreign share discount for a firm. To test the impact of analyst following, we split the full sample into two subsamples based on the sample median of analyst following. Specifically, we include a firm in the low-following subsample if the natural log of the number of analysts following it is lower than the median of the natural log of the number of analysts following it. Otherwise, we include the firm in the high-following subsample. We then run regressions using Equation (1) for both subsamples, respectively. The results are presented in the first two columns of Table 5. We report that the coefficient of RGB_NEWS is only significantly positive (coef.= 0.00637, t = 1.823) in the high-following subsample (i.e. low information asymmetry) in Regression 2, and not in the low-following subsample (i.e. high information asymmetry) in Regression 1. This implies that investors could be significantly influenced by the tone of media coverage when there are many analysts following. This finding contradicts Cumming et al. (2016), who suggest that the effect of the level of media coverage (i.e. number of news reports) on the foreign share discount is more pronounced among firms with a lower analyst following, as investors may depend on media coverage more if analysts' reports are less available. A plausible explanation for our results might be that firms with a greater analyst following usually

provide more informative disclosure (Lang and Lundholm, 1996). News about these firms could attract more attention from investors due to the high level of informativeness in the news, and consequently the tone of the news could have a greater impact on investors. Indeed, the results in Panel C of Table 4 show that the level of analyst following[15] is positively correlated with the sum (coef. = 0.6329, sig. at 5%), the average (coef. = 0.1460, sig. at 5%) and the median (coef. = 0.1446, sig. at 5%) level of investors' attention proxied by the SVI. This finding suggests that investors pay more attention to news reports about firms with a greater analyst following.

We also use analyst forecast dispersion as an alternative proxy for information asymmetry in our regressions, considering that analysts may be more likely to follow large firms or industry leaders, and the number of analysts following could be an inappropriate measure of information asymmetry. Forecast dispersion is calculated as the standard deviation of the Current EPS estimate for the specified fiscal time period, divided by the mean EPS estimate. Then we split the full sample into two subsamples based on the sample median of forecast dispersion. Specifically, we include a firm in the high-forecast-dispersion subsample if forecast dispersion is higher than the median forecast dispersion. Otherwise, we include the firm in the low-forecast-dispersion subsample. We run regressions using Equation (1) for both subsamples, respectively. The results are presented in the last two columns in Table 5. The coefficient of RGB_NEWS is only significantly positive (coef. = 0.00980, t = 2.052) in the low-forecast-dispersion subsample (i.e. low information asymmetry) in Regression 4, and not in the high-forecast-dispersion subsample (i.e. low information asymmetry) in Regression 3. Therefore, the results based on the alternative proxy (i.e. forecast dispersion) are very similar to those based on the number of analyst following.

[15]The level of analyst following is defined as the natural log of the number of analysts following multiplied by 100.

6.3. Robustness tests

We conduct several analyses to test the robustness of our results. First, as there might be an omitted variable concern for the relation between favouritism in news and foreign share discount, we use a change-in-change approach to address this potential problem. Specifically, we take the first difference by month for both the dependent variable and the independent variable. Then we run regressions using Equation (1). The results are presented in Table 6. The coefficient of RGB_NEWS is positive and highly significant across all specifications, similar to the results in Table 2.

Second, we run robustness tests using the Propensity Score Matching (PSM) approach. We use a nearest-neighbour propensity score matching based on year, month, industry,[16] region,[17] and firm and board characteristics (including market value, turnover, state ownership, stock returns, Beta, FSI, ROA, sales growth, Tobin's Q, ownership concentration, CEO shareholding, CEO duality, board independence, board size and number of board meetings). The results are presented in Table 7, and they are very similar to those presented in Table 2.

Third, to facilitate the interpretation of the coefficients, we log transform both the dependent variable and the main independent variable in Equation (1). We also remove the scale factor (i.e. 100) from the main independent variable. Then we re-run the regressions. The results are presented in Table 8. Regression 1 shows that after controlling for firm and

[16] Industries are defined based on the Global Industry Classification Standard (GICS) code. We consider the first two digits of the GICS code in our industry classification.
[17] We follow Firth et al. (2006) to define regions according to the level of economic development.

year fixed effects, the coefficient of RGB_NEWS is significantly positive (coef. = 0.0106, t = 2.37). This suggests that a one percent change in the relative favouritism in Chinese to English news increases the foreign share discount by approximately one basis point. After controlling for other determinants of foreign share discounts, the coefficient of RGB_NEWS is still significantly positive across Regression 2 to Regression 5.

Finally, as Cumming et al. (2016) find that the logarithm of the ratio of Chinese to English news reports affects the foreign share discount, we further examine whether our results are driven by such effect. We split the full sample into two subsamples based on the ratio of Chinese to English news reports. Specifically, we include a firm in the low-ratio subsample if the ratio of Chinese to English news reports is lower than the median of the ratio of Chinese to English news reports. Otherwise, we include the firm in the high-ratio subsample. We then run regressions using Equation (1) for both subsamples, respectively. The results are presented in Appendix B. We find that the coefficient of RGB_NEWS is significantly positive in both the low-ratio and the high-ratio subsamples, which suggests that our results are not likely to be driven by the ratio of the number of Chinese to English news reports.

7. Conclusion

This paper examines the effect of media censorship on stock price and foreign stock investments, using the setting of the foreign share discount puzzle in China, a topical issue in the literature. Existing studies on the puzzle have provided various explanations, such as the differential demand hypothesis (Stulz and Wasserfallen, 1995), the illiquidity risk of foreign shares (Amihud and Mendelson, 1986; Lee et al., 2001), speculative trading behaviours in the

A-share market (Scheinkman and Xiong, 2003) and the information disadvantage of B-share investors (Brennan and Cao, 1997). Besides these explanations, the role of the media in explaining the Chinese foreign share discount is attracting growing attention. For example, Cumming et al. (2016) show that the differential level of Chinese and English news coverage is significantly related to the foreign share discount. However, most studies in this area only explore the impact of the level of media coverage (i.e. the number of news reports in Chinese and English media) on the foreign share discount. Our study focuses on the role of an important institutional feature of the media, media censorship, in explaining the foreign share discount, by employing a direct measure of good and bad news based on readers' perceptions.

Our findings are summarised as follows. First, we show that Chinese media is generally much more positive about firms with dual classes of shares than English media, suggesting that the Chinese government may censor negative news to maintain economic stability. More importantly, such media censorship could affect stock price. Specifically, we find that firms with a higher level of positive news reports in Chinese relative to English media are associated with greater foreign share discounts. This result suggests that A-share investors are significantly influenced by the favourable tone of Chinese media, resulting in a larger difference between A-share and B-share price. In particular, we find that the larger the number of Chinese good news reports, the greater the foreign share discount, which is consistent with A-share price being higher and the gap between A-share and B-share price being wider when more favourable news is reported in Chinese media, all else being equal. Second, the co-existence of a large number of Chinese good news reports and a large number of English bad news reports could result in the widest gap between A-share price and B-share price and therefore lead to the highest level of foreign share discount. Third, using SVI to capture investors' attention, we report evidence that English bad news attracts more attention

from B-share investors, whereas Chinese good news attracts more attention from A-share investors. This may also help to explain the observed B-share investors' over-reaction to bad news. Finally, we show the effect of the positivity in Chinese news relative to English news on the foreign share discount to be more pronounced among firms with a better information environment, reflected by greater analyst coverage. Lang and Lundholm (1996) conclude that there is usually greater analyst following if firms provide more informative disclosures. It could be expected that news of these firms could contain more informative content and therefore attract more attention from investors, consequently having a greater impact on the price difference between A-B shares.

Our study has two important implications. First, media censorship could significantly affect international asset pricing. As shown in the Chinese setting, the government's tight control of the release of negative information leads to a wide divergence between the tone of Chinese and English media, and could have undesired capital market consequences (i.e. a large foreign share discount). Second, besides the level and tone of media coverage, the attention of domestic and foreign investors could also play an important role in explaining the impact of media coverage on the foreign share discount.

References

Amihud, Y., and Mendelson, H. (1986). Asset pricing and the bid-ask spread. Journal of Financial Economics, 17, 223-249.

Andrei, D., and Hasler, M. (2015). Investor attention and stock market volatility. Review of Financial Studies, 28, 33-72.

Antweiler, W., and Frank, M. Z. (2004). Is all that talk just noise? The information content of internet stock message boards. The Journal of Finance, 59, 1259-1294.

Bailey, W. (1994). Risk and return on China's new stock markets: some preliminary evidence. Pacific-Basin Finance Journal, 2, 243-260.

Barber, B.M., and Odean, T. (2008). All that glitters: the effect of attention and news on the buying behavior of individual and institutional investors. Review of Financial Studies, 21, 785-818.

Barber, B., Odean, T., and Zhu, N. (2009). Systematic noise. Journal of Financial Markets, 12, 547-569.

Basu, S. (1997). The conservatism principle and the asymmetric timeliness of earnings. Journal of Accounting and Economics, 24, 3-37.

Besley, T., and Burgess, R. (2002). The political economy of government responsiveness: Theory and evidence from India. The Quarterly Journal of Economics, 117, 1415-1451.

Besley, T., and Prat, A. (2006). Handcuffs for the grabbing hand? Media capture and government accountability. American Economic Review, 96, 720-736.

Brennan, M., and Cao, H. (1997). International portfolio investment flows. Journal of Finance, 52, 1851-1880.

Carey, P., Fang, V., and Zhang, H. F. (2016). The role of optimistic news stories in IPO pricing. Journal of International Financial Markets, Institutions and Money, 41, 16-29.

Chakravarty, S., Sarkar, A., and Wu, L. (1998). Information asymmetry, market segmentation and the pricing of cross-listed shares: theory and evidence from Chinese A and B shares. Journal of International Financial Markets, Institutions and Money, 8, 325-355.

Chan, K., Menkveld, A., and Yang, Z. (2008). Information asymmetry and asset prices: evidence from the China foreign share discount. Journal of Finance, 63, 159-196.

Chen, C. J., Chen, S., and Su, X. (2001). Is accounting information value-relevant in the emerging Chinese stock market? Journal of International Accounting, Auditing and Taxation, 10, 1-22.

Clatworthy, M. and Jones, M. J. (2003). Financial reporting of good news and bad news: evidence from accounting narratives. Accounting and Business Research, 33, 171-185.

Conrad, J., Cornell, B., and Landsman, W. R. (2002). When is bad news really bad news? Journal of Finance, 57, 2507-2532.

Cumming, D., Dixon, R., Hou, W., and Lee, E. (2016). Media coverage and foreign share discount puzzle in China. European Journal of Finance, 22, 393-412.

Da, Z., Engelberg, J., and Gao, P. (2011). In search of attention. Journal of Finance, 66, 1461-1499.

De Franco, G., Vasvari, F. P., Vyas, D., and Wittenberg-Moerman, R. (2013). Debt analysts' views of debt-equity conflicts of interest. The Accounting Review, 89, 571-604.

d'Haenens, L., Jankowski, N., and Heuvelman, A. (2004). News in online and print newspapers: Differences in reader consumption and recall. New Media and Society, 6, 363-382.

Djankov, S., McLiesh, C., Nenova, T., and Shleifer, A. (2003). Who owns the media? Journal of Law and Economics, 46, 341-382.

Ding, R., and Hou, W. (2015). Retail investor attention and stock liquidity. Journal of International Financial Markets, Institutions and Money, 37, 12-26.

Dougal, C., Engelberg, J., Garcia, D., and Parson, C. (2012). Journalists and the stock market. Review of Financial Studies, 25, 639-679.

Drake, M. S., Roulstone, D. T., and Thornock, J. R. (2012). Investor information demand: Evidence from Google searches around earnings announcements. Journal of Accounting Research, 50, 1001-1040.

Esarey, A. (2005). Cornering the market: state strategies for controlling China's commercial media. Asian Perspective, 29, 37-83.

Esarey, A. (2006). Speak no evil: Mass media control in contemporary China. Freedom House Special Report.

Engelberg, J.E., and Parsons, C. (2011). The causal impact of media in financial markets. Journal of Finance, 66, 67-97.

Engle, R. F., and Ng, V. K. (1993). Measuring and testing the impact of news on volatility. Journal of Finance, 48, 1749-1778.

Fang, L., and Peress, J. (2009). Media coverage and the cross-section of stock returns. The Journal of Finance, 64, 2023-2052.

Fernald, J., and Rogers, J. (2002). Puzzles in the Chinese stock market. The Review of Economics and Statistics, 84, 416-432.

Frieder, L., and Subrahmanyam, A. (2005). Brand perceptions and the market for common stock. Journal of Financial and Quantitative Analysis, 40, 57-85.

Gehlbach, S., and Sonin, K. (2014). Government control of the media. Journal of Public Economics, 118, 163-171.

Gong, S., and Gul, F. (2011). Chinese media coverage, divergence of opinion and stock market outcomes. Working paper, Hong Kong Polytechnic University.

Graham, J. R., Harvey, C. R., and Huang, H. (2009) Investor Competence, Trading Frequency, and Home Bias. Management Science, 55, 1094-1106.

Hassid, J. (2008). Controlling the Chinese media: An uncertain business. University of California, Reprinted from Asian Survey, 48, 414-430.

Hong, H., Kubik, J., and Stein, J.C. (2005). The neighbor's portfolio: word-of-mouth effects in the holdings and trades of money managers. Journal of Finance, 60, 2801-2824.

Hou, W., and Lee, E. (2014). Split Share Structure Reform, corporate governance, and the foreign share discount puzzle in China. The European Journal of Finance, 20, 703-727.

Houston, J. F., Lin, C., and Ma, Y. (2011). Media ownership, concentration and corruption in bank lending. Journal of Financial Economics, 100, 326-350.

Jindrichovska, I., and Mcleay, S. (2005). Accounting for good news and accounting for bad news: Some empirical evidence from the Czech Republic. European Accounting Review, 14, 635-655.

Kahneman, D. (1973). Attention and Effort. Prentice-Hall, Englewood Cliffs, NJ.

Kahneman, D., and Tversky, A. (1979). Prospect theory: an analysis of decision under risk. Econometrica, 47, 263-291.

Kothari, S. P., Li, X., and Short, J. E. (2009). The effect of disclosures by management, analysts, and business press on cost of capital, return volatility, and analyst forecasts: A study using content analysis. The Accounting Review, 84, 1639-1670.

Kim, J., Zhang, H., Li, L., and Tian, G. (2014). Press freedom, externally generated transparency and stock price informativeness: international evidence. Journal of Banking and Finance, 46, 299-310.

Lee, C. F., Chen, G. M., and Rui, O. M. (2001). Stock return and volatility on China's stock markets. Journal of Financial Research, 24, 523-543.

Li, F. (2010). The information content of forward-looking statements in corporate filings−A naïve Bayesian machine learning approach. Journal of Accounting Research, 48, 1049-1102.

Malmendier, U., and Tate, G. (2008). Who makes acquisitions? CEO overconfidence and the market's reaction. Journal of financial Economics, 89, 20-43.

Mei, J., Scheinkman, J. A., and Xiong, W. (2009). Speculative trading and stock prices: An analysis of Chinese A-B share premia. Annals of Economics and Finance, 10, 225-255.

Patell, J. M., and Wolfson, M. A. (1982). Good news, bad news, and the intraday timing of corporate disclosures. Accounting Review, 57, 509-527.

Peress, J. (2014). The media and the diffusion of information in financial markets: evidence from newspaper strikes. Journal of Finance, 69, 2007-2043.

Piotroski, J. D. and Wong, T. J. (2011). Institutions and information environment of Chinese listed firms, In Capitalizing China. Fan, J. and Morck. R. (Eds). University of Chicago Press, 201-242.

Piotroski, J. D., Wong, T. J., and Zhang, T. (2015). Political incentives to supress negative information: evidence from Chinese listed firms. Journal of Accounting Research, 53, 405-459.

Qinglian, H. (2004). Media control in China. In China Rights Forum, 1, 11-28.

Rogers, J. L., Buskirk, A. V., and Zechman, S. L. C. (2011). Disclosure tone and shareholder litigation. The Accounting Review, 86, 2155-2183.

Scheinkman, J., and Xiong, W. (2003). Overconfidence and speculative bubbles. Journal of Political Economy, 111, 1183-1219.

Scheufele, D. A. (1999). Framing as a theory of media effects. Journal of Communication, 49, 103-122.

Sen, Amartya. Development as freedom. Oxford Paperbacks, 2001.

Skinner, D. J. (1994). Why firms voluntarily disclose bad news. Journal of Accounting Research, 32, 38-60.

Skinner, D. J., and Sloan, R. G. (2002). Earnings surprises, growth expectations, and stock returns or don't let an earnings torpedo sink your portfolio. Review of Accounting Studies, 7, 289-312.

Stockmann, D. (2013). Media commercialization and authoritarian rule in China. New York, NY: Cambridge University Press.

Stulz, R.M., and Wasserfallen, W. (1995). Foreign equity investment restrictions, capital flight and shareholder wealth maximization: theory and evidence. Review of Financial Studies, 8, 1019-1057.

Sundar, S. S. (1998). Effect of source attribution on perception of online news stories. Journalism & Mass Communication Quarterly, 75(1), 55-68.

Sundar, S. S. (1999). Exploring receivers' criteria for perception of print and online news. Journalism and Mass Communication Quarterly, 76, 373-386.

Tang, V. W. (2011). Isolating the effect of disclosure on information risk. Journal of Accounting and Economics, 52, 81-99.

Tetlock, P. (2007). Giving content to investor sentiment: the role of media in the stock market. Journal of Finance 62, 1139-1168.

Tetlock, P., Saar-Tsechansky, M., and Macskassy, S. (2008). More than words: quantifying language to measure firms' fundamentals. Journal of Finance, 63, 1437-1467.

Tetlock, P. (2014). Information transmission in finance. Annual Review of Financial Economics, 6, 365-384.

Tewksbury, D., and Althaus, S. L. (2000). Differences in knowledge acquisition among readers of the paper and online versions of a national newspaper. Journalism and Mass Communication Quarterly, 77, 457-479.

Tong, W. S., and Yu, W. (2012). A corporate governance explanation of the A-B share discount in China. Journal of International Money and Finance, 31,125-147.

Tullock, Gordon. (1987). Autocracy. Springer Science & Business Media.

Vozlyublennaia, N. (2014). Investor attention, index performance, and return predictability. Journal of Banking & Finance, 41, 17-35.

Yermack, D. (1997). Good timing: CEO stock option awards and company news announcements. Journal of Finance, 52, 449-476.

Yohn, T. L. (1998). Information asymmetry around earnings announcements. Review of Quantitative Finance and Accounting, 11, 165-182.

Yue, Y., and Gong, N. (1997). Between tradition and modernity: Civil liberties in China. The China Strategic Review, 2, 40-52.

Figure 1. Average Foreign Share Discount (Jan 1998 – Dec 2008)

This figure shows the average monthly foreign share discounts of Chinese firms between January 1998 and December 2008.

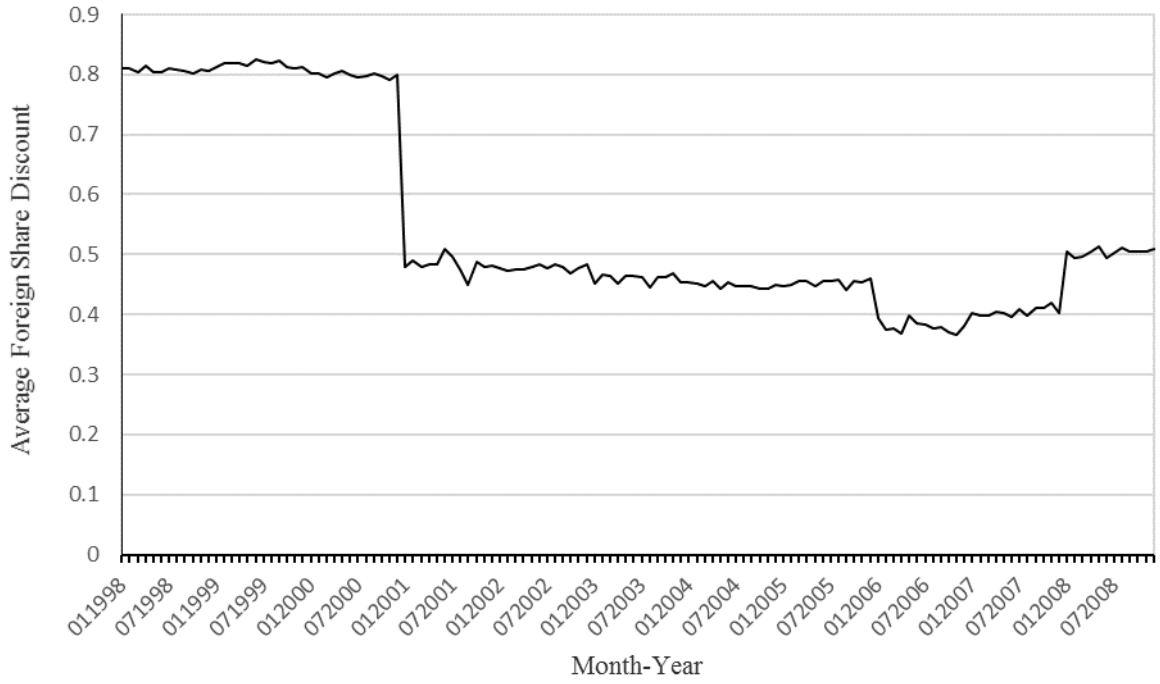
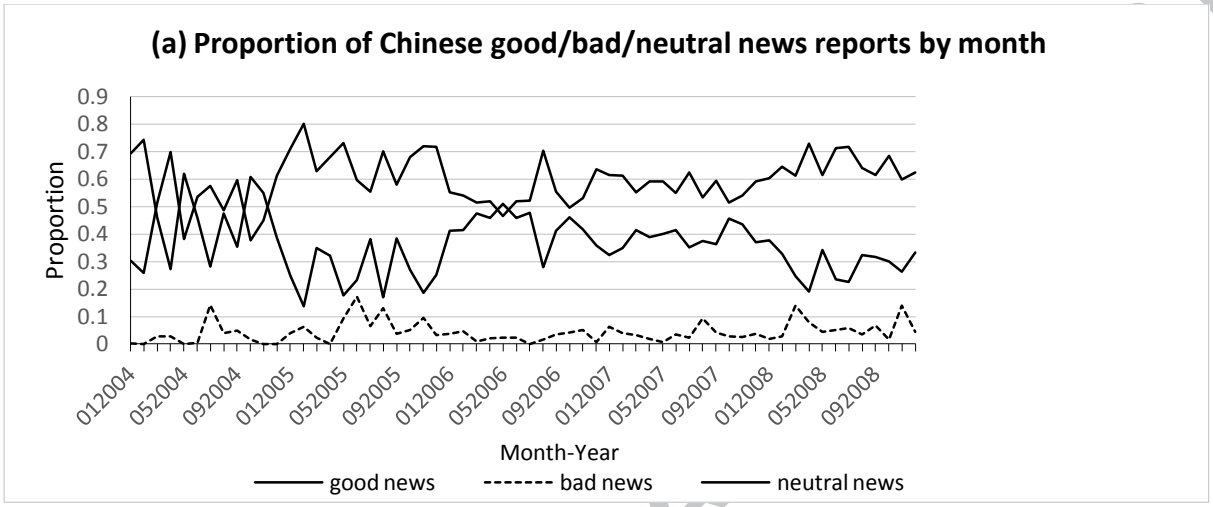
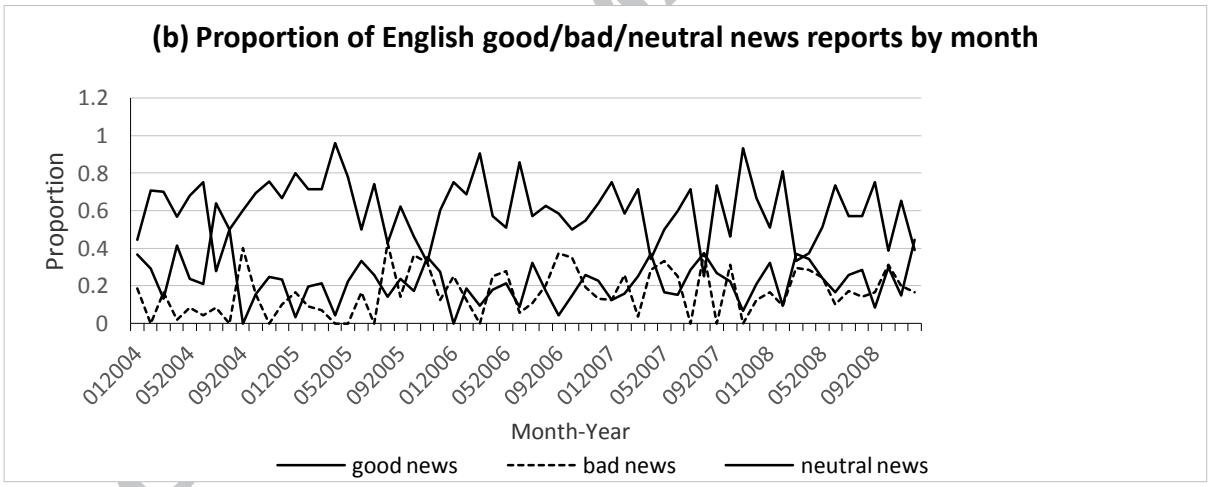


Figure 2. Average proportion of good/bad/neutral news reports

This figure shows the average monthly proportion of good/bad/neutral news reports in Chinese/English/total over our sample period.





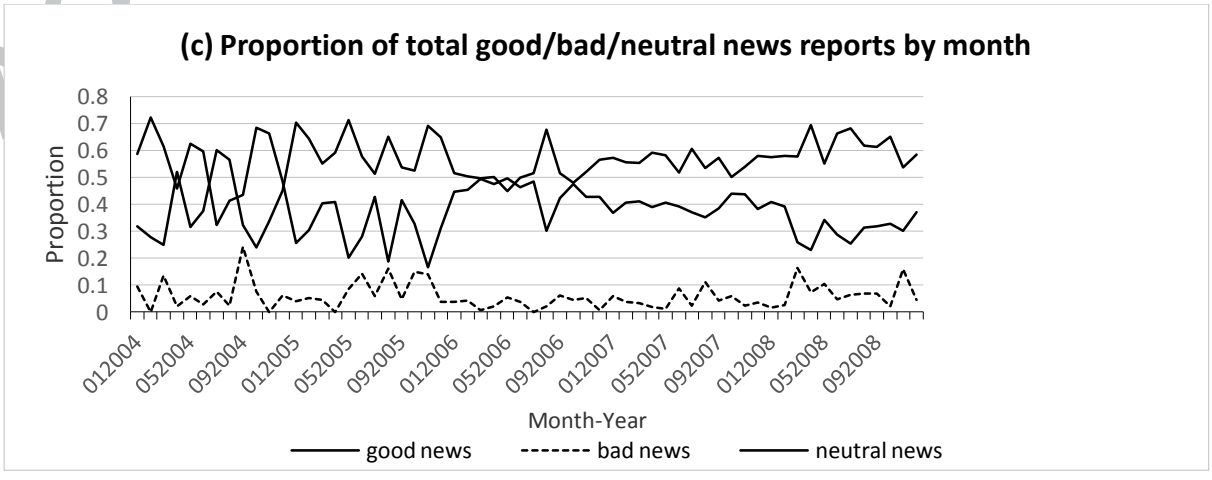


Table 1. Summary statistics

This table presents the summary statistics of the variables. The variables are defined in Appendix A.

Panel A Variables

Variable	Mean	Std. Dev.	Med	Min	Max	Obs.
ForeignDiscount	0.4366	0.1556	0.4513	0.0239	0.8069	4,218
RGB_NEWS	0.2039	0.6400	0.0100	0	7.1700	4,218
CGNEWS	0.2005	0.6097	0	0	3.4400	4,218
CBNEWS	0.0096	0.0721	0	0	1.2000	4,218
EGNEWS	0.0014	0.0059	0	0	0.0700	4,218
EBNEWS	0.0003	0.0026	0	0	0.1000	4,218
RelativeMV	1.1027	0.0894	1.0946	0.9400	1.3677	4,218
RelativeTO	1.3718	0.2565	1.3320	0.6769	4.0320	4,218
StateControl	0.7930	0.4052	1	0	1	4,218
Reform	0.4912	0.5000	0	0	1	4,218
RelativeRET	0.9928	6.1070	0.8466	-118.3679	168.6101	4,218
Beta	1.1319	0.3394	1.1276	0.0953	2.8371	4,218
FSI	-0.5561	1.9583	0.0156	-19.9922	0.9502	4,218
ROA	0.0002	0.0200	0.0014	-0.1021	0.0442	4,218
ΔSalesGrowth	0.2737	1.2348	0.1384	-0.8090	14.9185	4,218
TobinQ	0.6893	0.2431	0.7205	0.0001	1.5510	4,218
Leverage	0.5513	0.2722	0.5205	0.0874	2.0497	4,218
OwnershipC	0.1736	0.1263	0.1295	0.0044	0.6748	4,218
CHOLD	0.3046	0.4603	0	0	1	4,218
CDUAL	0.0308	0.1729	0	0	1	4,218
BINDP	0.1036	0.3048	0	0	1	4,218
BSIZE	0.3480	0.4764	0	0	1	4,218
BMEET	0.5372	0.4987	1	0	1	4,218

Panel B Number of news reports and the ratio of good to bad news per firm-month						
	Mean	Std. Dev.	Med	Min	Max	Obs.
Total number of Chinese language news reports	56.5085	129.1882	0	0	600	4,218
Total number of English language news reports	0.2466	0.9016	0	0	10	4,218
Chinese language good to bad news	21.0126	60.9803	1	0.0083	345	4,218
English language good to bad news	1.1226	0.5957	1	0.0909	8	4,218

Panel C Proportion of good, bad and neutral news reports							
		Mean	Std. Dev.	Med	Min	Max	Obs.
Chinese news	Good	0.3616	0.3335	0.4665	0	1	4,218
	Bad	0.0435	0.1488	0	0	1	4,218
	Neutral	0.5948	0.3191	0.5	0	1	4,218
English news	Good	0.6045	0.4606	1	0	1	4,218
	Bad	0.1714	0.3577	0	0	1	4,218
	Neutral	0.2240	0.3639	0	0	1	4,218
All news	Good	0.3936	0.3543	0.4930	0	1	4,218
	Bad	0.0569	0.1832	0	0	1	4,218
	Neutral	0.5495	0.3404	0.4857	0	1	4,218

The sample period covers 2004 to 2008 and includes A- and B-share cross-listing firms that traded in both the Shanghai and Shenzhen stock exchanges.

Table 2. The impact of favouritism in Chinese to English news on the foreign share discount

This table presents the impact of the ratio of favouritism in Chinese to English news on the foreign share discount.

Dep. Var.= ForeignDiscount	Regression (1)	Regression (2)	Regression (3)	Regression (4)	Regression (5)
RGB_NEWS	0.0076**	0.0101***	0.0074**	0.0101***	0.0074**
	(2.01)	(2.66)	(2.249)	(2.649)	(2.195)
RelativeMV		0.6137***	0.497*	0.614**	0.496*
		(2.56)	(1.940)	(2.558)	(1.928)
RelativeTO		0.0921***	0.0734***	0.0922***	0.0737***
		(5.08)	(4.384)	(5.072)	(4.382)
StateControl		0.0395**	0.0350**	0.0395**	0.0350**
		(2.42)	(2.240)	(2.417)	(2.231)
Reform		–0.0388***	-0.110***	-0.0389***	-0.111***
		(–3.59)	(-10.07)	(-3.588)	(-10.16)
RelativeRET		0.0003	0.000114	0.000284	0.000131
		(1.28)	(0.523)	(1.281)	(0.594)
Beta		–0.0081	0.0268*	-0.00812	0.0267*
		(–0.53)	(1.678)	(-0.530)	(1.668)
FSI		–0.0065*	-0.000419	-0.00647*	-0.000464
		(–1.74)	(-0.224)	(-1.732)	(-0.250)
ROA		–0.3839	-0.471*	-0.384	-0.473*
		(–1.43)	(-1.858)	(-1.429)	(-1.852)
ΔSalesGrowth		0.0052*	0.00396	0.00520	0.00386
		(1.64)	(1.273)	(1.629)	(1.232)
TobinQ		–0.0402*	-0.00203	-0.0402*	-0.00204
		(–1.70)	(-0.0969)	(-1.697)	(-0.0968)
Leverage		0.1288*	0.0741	0.129*	0.0738
		(1.73)	(1.173)	(1.733)	(1.165)
OwnershipC		0.0745	0.137**	0.0743	0.138**
		(0.59)	(2.182)	(0.590)	(2.183)
CHOLD		–0.0185	-0.0139	-0.0185	-0.0140
		(–0.79)	(-0.666)	(-0.789)	(-0.667)
CDUAL		–0.0295	-0.0137	-0.0295	-0.0135
		(–1.01)	(-0.458)	(-1.010)	(-0.453)
BINDP		0.0145	0.0177	0.0144	0.0180
		(0.77)	(1.113)	(0.770)	(1.122)
BSIZE		–0.0283	-0.0128	-0.0282	-0.0130
		(–1.27)	(-0.600)	(-1.268)	(-0.607)
BMEET		–0.0109	-0.00233	-0.0109	-0.00230
		(–0.94)	(-0.207)	(-0.943)	(-0.203)
constant	0.3913***	–0.4123	-0.170	-0.412	-0.166
	(45.42)	(–1.52)	(-0.572)	(-1.516)	(-0.559)
Firm fixed effects	Yes	No	Yes	Yes	Yes
Year fixed effects	Yes	No	Yes	No	Yes
Month fixed effects	No	No	No	Yes	Yes
R-squared	0.0357	0.0333	0.1241	0.0333	0.1260
Obs.	4,218	4,218	4,218	4,218	4,218

*, ** and *** indicate statistical significance at the 0.10, 0.05 and 0.01 levels, respectively, under two-tailed tests. The variables are defined in Appendix A. t-statistics are in parentheses.

Table 3. Chinese language good and bad news vs English language good and bad news

This table presents the impact of the number of Chinese and English news reports on the foreign share discount.

Dep. Var.= ForeignDiscount	Regression (1)	Regression (2)	Regression (3)	Regression (4)	Regression (5)	Regression (6)	Regression (7)
CGNEWS	0.0079*	0.0085***	0.0071*	0.0074***	0.00654*	0.00852**	0.00643
	(1.79)	(3.16)	(1.85)	(2.71)	(1.691)	(2.031)	(1.654)
EBNEWS	0.389	0.742	0.533	0.223	0.168	0.342	0.184
	(0.78)	(1.24)	(1.54)	(0.35)	(0.462)	(0.606)	(0.497)
CGNEWS*EBNEWS				2.035**	1.460*	2.009*	1.478*
				(2.32)	(1.760)	(1.886)	(1.803)
RelativeMV		0.419***	0.478*	0.419***	0.499*	0.615**	0.498*
		(6.90)	(1.86)	(6.90)	(1.955)	(2.574)	(1.942)
RelativeTO		0.0912***	0.0739***	0.0910***	0.0734***	0.0921***	0.0736***
		(12.97)	(4.43)	(12.95)	(4.379)	(5.062)	(4.378)
StateControl		0.0367***	0.0349**	0.0365***	0.0346**	0.0389**	0.0346**
		(5.12)	(2.23)	(5.08)	(2.214)	(2.398)	(2.204)
Reform		-0.0373***	-0.110***	-0.0373***	-0.110***	-0.0390***	-0.111***
		(-10.20)	(-10.15)	(-10.20)	(-10.09)	(-3.615)	(-10.19)
RelativeRET		0.0003	0.0001	0.0003	0.000119	0.000290	0.000137
		(1.09)	(0.49)	(1.11)	(0.544)	(1.303)	(0.618)
Beta		-0.0086	0.0291*	-0.0089	0.0266*	-0.00835	0.0265
		(-1.56)	(1.77)	(-1.61)	(1.668)	(-0.546)	(1.658)
FSI		-0.0068***	-0.0005	-0.0069***	-0.000437	-0.00647*	-0.000482
		(-8.01)	(-0.26)	(-8.03)	(-0.233)	(-1.729)	(-0.258)
ROA		-0.421***	-0.424*	-0.420***	-0.469*	-0.381	-0.471*
		(-3.72)	(-1.66)	(-3.77)	(-1.851)	(-1.422)	(-1.846)
ΔSalesGrowth		0.0049***	0.0037	0.0049***	0.00396	0.00520	0.00387
		(3.32)	(1.19)	(3.32)	(1.273)	(1.629)	(1.231)
TobinQ		-0.0410***	-0.0001	-0.0414***	-0.00198	-0.0402*	-0.00201
		(-4.64)	(-0.0033)	(-4.69)	(-0.0948)	(-1.699)	(-0.0956)

Leverage		0.128***	0.0704	0.128***	0.0746	0.129*	0.0743
		(6.44)	(1.11)	(6.47)	(1.183)	(1.747)	(1.176)
OwnershipC		0.0807**	0.135**	0.0830**	0.135**	0.0715	0.136**
		(2.33)	(2.14)	(2.40)	(2.159)	(0.569)	(2.162)
CHOLD		-0.0198***	-0.0143	-0.0194***	-0.0138	-0.0184	-0.0139
		(-2.79)	(-0.69)	(-2.74)	(-0.660)	(-0.783)	(-0.662)
CDUAL		-0.0281**	-0.0142	-0.0282**	-0.0138	-0.0298	-0.0138
		(-2.19)	(-0.48)	(-2.20)	(-0.462)	(-1.014)	(-0.458)
BINDP		0.0159**	0.0141	0.0161**	0.0176	0.0143	0.0179
		(2.20)	(0.88)	(2.22)	(1.105)	(0.766)	(1.115)
BSIZE		-0.0310***	-0.0107	-0.0314***	-0.0129	-0.0283	-0.0131
		(-4.97)	(-0.50)	(-5.04)	(-0.604)	(-1.273)	(-0.610)
BMEET		-0.0093**	-0.0030	-0.0093**	-0.00232	-0.0109	-0.00229
		(-2.34)	(-0.27)	(-2.34)	(-0.206)	(-0.943)	(-0.202)
constant	0.493***	-0.188***	-0.160	-0.188***	-0.172	-0.412	-0.167
	(73.16)	(-2.69)	(-0.54)	(-2.68)	(-0.579)	(-1.521)	(-0.565)
Firm fixed effects	Yes	No	Yes	No	Yes	Yes	Yes
Year fixed effects	Yes	No	Yes	No	Yes	No	Yes
Month fixed effects	No	No	No	No	No	Yes	Yes
R-squared	0.0526	0.0527	0.11316	0.0533	0.1242	0.0322	0.1224
Obs.	4,218	4,218	4,218	4,218	4,218	4,218	4,218

*, ** and *** indicate statistical significance at the 0.10, 0.05 and 0.01 levels, respectively, under two-tailed tests. The variables are defined in Appendix A. t-statistics are in parentheses.

Table 4. Correlation of SVI with good news, bad news and analyst following

Panels A and B present the correlations of the average (median) attention from local (foreign) investors with Chinese (English) language good and bad news. Chinese (English) SVI is a proxy of local (foreign) investor attention. Panel C presents the correlations of the average (median) attention with the number of analysts following.

			Panel A Correlation of SVI with Chinese language good and bad news			
Dep. Var.	Chinese Sum SVI		Chinese Avg. SVI		Chinese Med. SVI	
CGNEWS	0.1739***		0.0401***		0.0396***	
	(4.96)		(5.09)		(5.06)	
CBNEWS		0.1997		0.0472		0.0438
		(1.13)		(1.15)		(1.09)
Firm fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
Year fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
R-squared	0.0108	0.0100	0.0110	0.0100	0.0106	0.0100
Obs.	4,237	4,237	4,237	4,237	4,237	4,237
			Panel B Correlation of SVI with English language good and bad news			
Dep. Var.	English Sum SVI		English Avg. SVI		English Med. SVI	
EGNEWS	0.7985		0.0933		0.2556	
	(0.809)		(0.13)		(0.31)	
EBNEWS		20.7203***		4.2445**		4.1698**
		(2.72)		(2.70)		(2.61)
Firm fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
Year fixed effects	Yes	Yes	Yes	Yes	Yes	Yes
R-squared	0.0140	0.0101	0.0131	0.0100	0.0136	0.0100
Obs.	1,226	1,226	1,226	1,226	1,226	1,226
		Panel C Correlation of SVI with number of analysts following				
Dep. Var.	Total Sum SVI		Total Avg. SVI		Total Med. SVI	
Analyst following	0.6329**		0.1460**		0.1446**	
	(2.37)		(2.35)		(2. 34)	
Firm fixed effects	Yes		Yes		Yes	
Year fixed effects	Yes		Yes		Yes	
R-squared	0.0377		0.0381		0.0378	
Obs.	1,064		1,064		1,064	

*, ** and *** indicate statistical significance at the 0.10, 0.05 and 0.01 levels, respectively, under two-tailed tests. The variables are defined in Appendix A. t-statistics are in parentheses.

Table 5. Information asymmetry and foreign share discount

This table presents the impact of information asymmetry on the relationship between the ratio of favouritism in Chinese to English news and the foreign share discount for a firm. In Regressions (1) and (2), we use analyst following to proxy for information asymmetry. In Regressions (3) and (4), we use analyst forecast dispersion to proxy for information asymmetry.

Dep. Var.= ForeignDiscount	Regression (1) Low following	Regression (2) High following	Regression (3) High forecast dispersion	Regression (4) Low forecast dispersion
RGB_NEWS	0.00167	0.00637*	0.00187	0.00980*
	(0.286)	(1.823)	(0.262)	(2.052)
RelativeMV	0.418	0.570*	1.393***	1.632***
	(1.036)	(1.993)	(3.752)	(3.483)
RelativeTO	0.0825***	0.0632***	-0.0502	-0.120
	(3.630)	(2.863)	(-1.086)	(-1.162)
StateControl	0.0120	0.0518**	-0.0711	-0.0410
	(0.567)	(2.491)	(-0.964)	(-1.208)
Reform	-0.105***	-0.113***	0.0224	0.0571
	(-7.634)	(-4.933)	(0.548)	(0.695)
RelativeRET	0.000125	0.000255	0.00186	-0.00273*
	(0.439)	(0.702)	(1.299)	(-2.004)
Beta	0.0217	0.00967	-0.0838	0.0449
	(1.468)	(0.292)	(-0.863)	(0.869)
FSI	-0.000389	-0.00103	0.00463	-0.00989
	(-0.169)	(-0.406)	(0.532)	(-1.452)
ROA	-0.247	-0.629	-6.959***	-3.112**
	(-1.058)	(-1.011)	(-4.854)	(-2.807)
ΔSalesGrowth	0.00108	0.00536	0.0470	0.0825
	(0.227)	(1.482)	(1.688)	(1.649)
TobinQ	0.0197	-0.0716*	-0.0851	0.0751
	(0.884)	(-1.707)	(-1.037)	(0.769)
Leverage	0.0347	0.122	-0.861***	-0.0699
	(0.545)	(1.286)	(-3.163)	(-0.370)
OwnershipC	0.126*	0.0718	0.698	0.669
	(1.946)	(0.243)	(0.876)	(1.486)
CHOLD	-0.0121	-0.0215	0.0352	0.0833***
	(-0.344)	(-0.832)	(0.678)	(3.501)
CDUAL	-0.0446	0.00983	-0.0199	0.212***
	(-1.182)	(0.313)	(-0.701)	(4.207)
BINDP	-0.0218	0.0773***	-0.149***	-0.166**
	(-1.101)	(3.147)	(-4.426)	(-2.411)
BSIZE	0.0337	-0.0632**	0.0375	0.0424
	(1.185)	(-2.555)	(1.043)	(0.733)
BMEET	-0.00178	-0.0164	0.0292	0.0497*
	(-0.125)	(-1.016)	(0.921)	(1.770)
Constant	-0.0674	-0.193	-0.371	-1.364**
	(-0.148)	(-0.566)	(-0.786)	(-2.106)
Firm fixed effects	Yes	Yes	Yes	Yes
Year fixed effects	Yes	Yes	Yes	Yes
R-squared	0.0236	0.2253	0.2357	0.1388
Obs.	2,224	1,994	2,091	2,127

*, ** and *** indicate statistical significance at the 0.10, 0.05 and 0.01 levels, respectively, under two-tailed tests. The variables are defined in Appendix A. t-statistics are in parentheses.

Table 6. Regression results based on change-in-change

This table presents the impact of the ratio of favouritism in Chinese to English news on the foreign share discount.

Dep. Var.= ForeignDiscount	Regression (1)	Regression (2)	Regression (3)	Regression (4)	Regression (5)
RGB_NEWS	0.0097***	0.0100***	0.0097***	0.0100***	0.0096***
	(3.88)	(4.06)	(3.98)	(4.06)	(3.86)
RelativeMV		0.0025	-0.0038	0.0190	-0.0047
		(0.34)	(-0.09)	(0.54)	(-0.12)
RelativeTO		0.0552***	0.0565***	0.0555***	0.0563***
		(4.86)	(4.91)	(4.86)	(4.96)
StateControl		-0.0006	-0.0025	0.0001	-0.0024
		(-0.35)	(-0.76)	(0.03)	(-0.69)
Reform		-0.0102***	-0.0417***	-0.0126***	-0.0414***
		(-4.63)	(-4.87)	(-4.44)	(-4.81)
RelativeRET		0.0001	0.0001	0.0001	0.0001
		(0.66)	(0.67)	(0.66)	(0.64)
Beta		-0.0007	0.0021	-0.0016	0.0025
		(-0.36)	(0.79)	(-0.67)	(0.91)
FSI		-0.0002	0.0004	0.0000	0.0004
		(-0.53)	(1.08)	(0.05)	(1.00)
ROA		0.0053	-0.0327	0.0066	-0.0318
		(0.15)	(-0.60)	(0.15)	(-0.56)
ΔSalesGrowth		-0.0002	0.0002	-0.0003	0.0001
		(-0.64)	(0.38)	(-0.52)	(0.26)
TobinQ		-0.0063*	-0.0015	-0.0093**	-0.0024
		(-1.91)	(-0.34)	(-2.40)	(-0.50)
Leverage		0.0000	0.0024	0.0265***	0.0019
		(0.00)	(0.18)	(2.81)	(0.14)
OwnershipC		-0.0021	-0.0266*	-0.0399**	-0.0272*
		(-0.43)	(-1.90)	(-2.47)	(-1.94)
CHOLD		0.0019	-0.0001	0.0015	0.0003
		(1.23)	(-0.03)	(0.34)	(0.06)
CDUAL		-0.0086	-0.0089	-0.0144**	-0.0088
		(-1.60)	(-1.54)	(-2.35)	(-1.50)
BINDP		-0.0017	-0.0005	-0.0041	-0.0007
		(-0.85)	(-0.13)	(-1.35)	(-0.21)
BSIZE		-0.0019	0.0028	-0.0013	0.0027
		(-1.18)	(0.83)	(-0.38)	(0.76)
BMEET		0.0018	0.0022	0.0012	0.0022
		(1.31)	(1.06)	(0.61)	(1.04)
Constant	0.0011	0.0075	0.0454	-0.0139	0.0434
	(1.17)	(0.82)	(0.95)	(-0.35)	(0.92)
Firm fixed effects	Yes	No	Yes	Yes	Yes
Year fixed effects	Yes	No	Yes	No	Yes
Month fixed effects	No	No	No	Yes	Yes
R-squared	0.0067	0.0313	0.0320	0.0250	0.0435
Obs.	3,432	3,432	3,432	3,432	3,432

*, ** and*** indicate statistical significance at the 0.10, 0.05 and 0.01 levels, respectively, under two-tailed tests. The variables are defined in Appendix A. t-statistics are in parentheses.

Table 7. Regression results based on PSM

This table presents the robustness test on the impact of the ratio of favouritism in Chinese to English news on the foreign share discount. We use a nearest-neighbor propensity score matching based on year, month, industry, region, firm and board characteristics.

Dep. Var.= ForeignDiscount	Regression (1)	Regression (2)	Regression (3)	Regression (4)	Regression (5)
RGB_NEWS	0.0103***	0.0089**	0.0073**	0.0099**	0.0077**
	(2.90)	(2.30)	(2.23)	(2.52)	(2.30)
RelativeMV		0.1168	0.2675	0.3611	0.2798
		(0.63)	(0.93)	(1.20)	(0.99)
RelativeTO		0.0774***	0.0664***	0.0800***	0.0682***
		(2.88)	(2.95)	(3.01)	(2.99)
StateControl		0.0213	0.0298*	0.0278	0.0280
		(1.32)	(1.70)	(1.49)	(1.58)
Reform		-0.0253**	-0.1127***	-0.0266**	-0.1140***
		(-2.12)	(-7.93)	(-2.13)	(-7.65)
RelativeRET		0.0003	0.0001	0.0003	0.0002
		(0.66)	(0.38)	(0.76)	(0.51)
Beta		-0.0142	0.0330	-0.0157	0.0331
		(-0.70)	(1.40)	(-0.72)	(1.40)
FSI		-0.0154***	-0.0030	-0.0145***	-0.0029
		(-4.46)	(-1.19)	(-4.27)	(-1.16)
ROA		-0.7522	-0.7692*	-0.6151	-0.7729*
		(-1.46)	(-1.70)	(-1.11)	(-1.73)
ΔSalesGrowth		0.0070***	0.0071***	0.0078***	0.0065***
		(3.25)	(2.79)	(3.31)	(2.89)
TobinQ		-0.0507*	0.0068	-0.0474	0.0072
		(-1.72)	(0.26)	(-1.60)	(0.27)
Leverage		0.1397***	0.0212	0.1516	0.0205
		(2.82)	(0.24)	(1.66)	(0.23)
OwnershipC		-0.0493	0.0120	-0.1040	0.0280
		(-0.39)	(0.13)	(-0.49)	(0.31)
CHOLD		-0.0248	-0.0068	-0.0183	-0.0094
		(-1.12)	(-0.35)	(-0.70)	(-0.49)
CDUAL		-0.0340	0.0038	-0.0357	0.0057
		(-1.59)	(0.18)	(-1.61)	(0.27)
BINDP		0.0286	0.0127	0.0210	0.0114
		(0.85)	(0.53)	(0.62)	(0.47)
BSIZE		-0.0543**	-0.0277	-0.0505*	-0.0277
		(-2.15)	(-1.04)	(-1.78)	(-1.05)
BMEET		-0.0181	-0.0068	-0.0200	-0.0047
		(-1.28)	(-0.53)	(-1.36)	(-0.37)
Constant	0.4737***	0.2037	0.1278	-0.1029	0.1189
	(72.48)	(0.96)	(0.39)	(-0.30)	(0.37)
Firm fixed effects	Yes	No	Yes	Yes	Yes
Year fixed effects	Yes	No	Yes	No	Yes
Month fixed effects	No	No	No	Yes	Yes
R-squared	0.1283	0.0797	0.2072	0.0379	0.2152
Obs.	1,756	1,756	1,756	1,756	1,756

*, ** and *** indicate statistical significance at the 0.10, 0.05 and 0.01 levels, respectively, under two-tailed tests. The variables are defined in Appendix A. t-statistics are in parentheses.

Table 8. Regression results based on the use of the natural log of the dependent and the main independent variable

This table presents the impact of the ratio of favouritism in Chinese to English news on the foreign share discount, using the natural log of ForeignDiscount as the dependent variable and the natural log of RGB_NEWS as the main independent variable.

Dep. Var.= Ln_ForeignDiscount	Regression (1)	Regression (2)	Regression (3)	Regression (4)	Regression (5)
Ln_RGB_NEWS	0.0106**	0.0081*	0.0073*	0.0080*	0.0073*
	(2.37)	(1.91)	(1.74)	(1.90)	(1.73)
RelativeMV		0.6247	1.1371	0.6436	1.1338
		(0.98)	(1.29)	(0.99)	(1.28)
RelativeTO		0.2078***	0.2155***	0.2089***	0.2161***
		(4.23)	(4.36)	(4.25)	(4.37)
StateControl		0.0908**	0.0954**	0.0909**	0.0953**
		(2.52)	(2.57)	(2.53)	(2.56)
Reform		-0.0719**	-0.0769**	-0.0722**	-0.0771**
		(-2.26)	(-2.32)	(-2.27)	(-2.32)
RelativeRET		0.0014	0.0015	0.0014	0.0015
		(1.25)	(1.29)	(1.25)	(1.28)
Beta		-0.0018	-0.0028	-0.0021	-0.0029
		(-0.04)	(-0.06)	(-0.05)	(-0.06)
FSI		-0.0144	-0.0133	-0.0144	-0.0133
		(-1.02)	(-0.95)	(-1.01)	(-0.95)
ROA		-1.3932**	-1.2287*	-1.3864**	-1.2315*
		(-2.07)	(-1.92)	(-2.06)	(-1.92)
ΔSalesGrowth		0.0120*	0.0126*	0.0120*	0.0126*
		(1.75)	(1.81)	(1.75)	(1.80)
TobinQ		-0.1007	-0.0982	-0.0999	-0.0976
		(-1.49)	(-1.46)	(-1.47)	(-1.45)
Leverage		0.3624**	0.4023**	0.3637**	0.4019**
		(2.38)	(2.00)	(2.36)	(2.00)
OwnershipC		0.1570	0.1064	0.1537	0.1050
		(0.46)	(0.25)	(0.44)	(0.24)
CHOLD		-0.1123*	-0.1100	-0.1120*	-0.1098
		(-1.73)	(-1.63)	(-1.72)	(-1.62)
CDUAL		-0.0794	-0.0885	-0.0797	-0.0883
		(-0.97)	(-1.06)	(-0.98)	(-1.06)
BINDP		0.0876	0.0814	0.0868	0.0809
		(1.43)	(1.34)	(1.42)	(1.33)
BSIZE		-0.1483**	-0.1397*	-0.1476**	-0.1393*
		(-1.98)	(-1.80)	(-1.97)	(-1.79)
BMEET		-0.0306	-0.0363	-0.0313	-0.0367
		(-0.81)	(-0.94)	(-0.83)	(-0.96)
constant	-0.9219***	-1.9959***	-2.6012**	-2.0240***	-2.6033**
	(-367.35)	(-2.80)	(-2.61)	(-2.81)	(-2.61)
Firm fixed effects	Yes	No	Yes	Yes	Yes
Year fixed effects	Yes	No	Yes	No	Yes
Month fixed effects	No	No	No	Yes	Yes
R-squared	0.0167	0.0656	0.0429	0.0648	0.0432
Obs.	4,218	4,218	4,218	4,218	4,218

*, ** and *** indicate statistical significance at the 0.10, 0.05 and 0.01 levels, respectively, under two-tailed tests. The variables are defined in Appendix A. t-statistics are in parentheses.

Highlights

- There is a long-standing foreign share discount puzzle in China
- Government censors negative news and stresses positive news of Chinese media
- The ratio of positive to negative news is substantially higher for Chinese than English newspapers
- Such favoritism is found to inflate the price of domestic A-shares
- The news perception distorted by media censorship helps to explain the puzzle